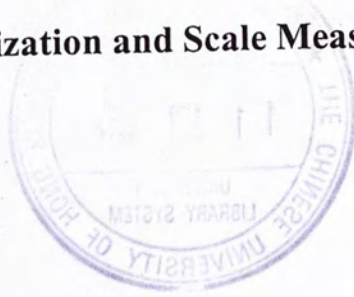


**Female Role Orientation of Chinese Women:
Conceptualization and Scale Measurement**



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**A Thesis Submitted in Partial Fulfillment
of the Requirements for the Degree of
Master of Philosophy
in
Marketing**

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Abstract of thesis entitled:

Female Role Orientation of Chinese Women: Conceptualization and Scale Measurement

Submitted by **Lam Wang**

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ABSTRACT (ENGLISH)

This study focus on conceptual and measurement issues related to female role orientation (FRO). “FRO” is defined as the extent of women’s attitudes about how to perform their roles as lovers, wives, mothers, employees and citizens of their country. The objective of the study is to create an FRO scale that can be used to identify and classify between Chinese women consumers according to the type and degree of their FRO. Although Arnott’s feminism scale (1972) is currently widely used by marketing researchers to classify between different women in order to understand their consumption behavior, this thirty-year-old scale is inadequate to capture women’s attitudes about their roles today. The social and economic changes that have taken place in the last thirty years have profoundly affected women’s attitudes about how to perform their roles in their daily lives. Moreover, it is questionable whether Arnott’s feminism scale, which was designed with western women in mind, is a robust measurement tool in other cultural environments. Therefore, this study aims to

propose a more suitable scale that can serve as an effective instrument to advance our understanding of female consumption behavior in general and in China in particular.

To develop a reliable and valid measure of female role orientation, this study first reviews the literature and conceptualizes the important dimensions of FRO. On the basis of the hypothesis that female role orientation is a multidimensional construct consisting of six dimensions, which we call “wifehood orientation,” “motherhood orientation,” “career orientation,” “appearance orientation,” “societal orientation,” and “love orientation,” a series of studies and analyses were conducted following Churchill's (1979) procedure. Data was collected by interviewing Chinese women in Hong Kong, Shanghai, Dalian, and Lanzhou. We assessed the psychometric properties of the proposed scale by conducting a series of rigorous tests and concluded that the scale is satisfactorily reliable and valid. The generalizability of the FRO scale to different cities of PRC was tested and found to be encouraging.

Next, we compared the FRO scale developed in this paper with Arnott's feminism scale (1972). The findings suggest, first, that Arnott's feminism scale mainly focuses on women's wifehood and motherhood roles but neglects the other roles performed by modern women. Second, Arnott's feminism scale seems unable to predict Chinese women's attitudes toward different consumption values, which indicates that it is not applicable to Chinese women. In a final section of the paper, the

academic and managerial contributions and implications of the study are reviewed, its limitations are discussed, and directions for future research are proposed.

ABSTRACT (CHINESE)

本論文的研究重點在於探討「女性角色取向」(Female Role Orientation)，並根據此取向發展一套測量工具。本文將「女性角色取向」(Female Role Orientation)定義為：現代女性在演繹自己在生活中的各種(例如：女性、情人、妻子、母親、僱員及國家公民等)角色時所採取的態度及信念。作者建立「女性角色取向測量工具」的目的在於測量並找出女性在演繹其不同角色所抱持的不同態度，並藉此工具將女性分門別類，作為日後進一步探討女性消費行為的基本工具。

在目前的市場學領域中，學者最常用的女性分類工具是 Arnott 的女性主義測量工具 (Arnott's Feminism Scale 1972)。學者用它分辨不同的女性消費群，並探討這些不同類別的女性所特有的消費行為。但此一工具乃根據三十多年前社會對女性的認知及評價所發展而來。作者質疑 Arnott 的女性主義測量工具能否涵蓋三十多年來因社會及經濟變遷而發展出來的多元化而複雜的女性角色。除此之外，Arnott 的女性主義測量工具乃以美國女性及其文化觀點作為發展基礎。我們也懷疑它能否同樣地適用於例如中國文化等不同的文化領域當中。因此，本文主旨在於檢討並補足目前所使用的女性分類工具，加入更多女性角色取向元素，使其測量層面更豐富，更能涵蓋目前多元化且複雜的女性角色。

為使本文所提出的「女性角色取向測量工具」具備良好的信度(Reliability)及效度(Validity)，作者首先根據相關文獻定義何謂「女性角色取向」，並根據相關理念提出女性角色之六大取向：妻子取向(Wifehood Orientation)、母親取向(Motherhood Orientation)、僱員取向(Career Orientation)、外在美取向(Appearance Orientation)、社會貢獻取向(Societal Orientation)及愛情取向(Love Orientation)。然後，根據 Churchill (1979)所建議的步驟，分別於香港、上海、大連及蘭州訪問不同背景的中國女性，逐步建立出具備滿意信度及效度的「女性角色取向測量工具」。

在同樣的問卷調查中，我們也同時收集了中國女性對 Arnott 的女性主義測量工具的回應。我們將兩種工具加以比較，結果發現：

- 一、Arnott 的女性主義測量工具只集中測量女性的妻子取向(Wifehood Orientation)和母親取向(Motherhood Orientation)，並未全面涵蓋時下女性所扮演的其他角色。
- 二、Arnott 的女性主義測量工具對女性的消費價值觀(Consumption Value)有極弱的預測能力。相比本文所提出的「女性角色取向測量工具」，其預測能力乏善可陳。

最後，作者根據研究所得論述是次研究對學術界及業界的貢獻並提出本研究不足之處及未來的研究方向。

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CHAPTER ONE

INTRODUCTION

1.1 Background

In the past two decades, China has gradually transformed its centrally planned economy into a market-oriented one. This transformation has led to a remarkable growth in GNP, averaging about 10 percent annually over the past two decades. Meanwhile, the GNP per capita has increased significantly, from RMB 379 in 1978 to RMB 7,543 in 2001 (China Statistical Yearbook 2001). The emergence of a new consumer society in Mainland China has attracted the attention of consumer researchers (e.g., Chan and Lin 1992; Ettenson and Wagner 1991; Ho and Sin 1988; Kindel 1983; LaTour and Henthorne 1990; Sin and Ho 2001; Tai and Tam 1997; Yau 1988; Yau 1995).

Women, who make up approximately half of Chinese consumers, have a tremendous influence on consumption and purchase decisions. Not surprisingly, in the last few years, a burgeoning growth has been witnessed in markets for skin care products, cosmetics, fragrances, and apparel for women in China (Sum 1997). In a qualitative study on female consumers, Thompson, Pollio, and Locander (1994) found

that women's consumption behavior is consistent with their beliefs. For example, one woman wished to recapture her youthful innocence, and this desire led her to prefer antiques over contemporary products. Another woman, a devoted mother of two children, shopped with the aim of getting a good deal. Thus, it is necessary for both researchers and marketers to understand women's beliefs in order for them to comprehend female consumer behavior (Bristor and Fischer 1993).

There are some previous studies that focus on Chinese consumer behavior (Chan and Lin 1992; Ettenson and Wagner 1991; Kindel 1983; LaTour and Henthorne 1990; Yau 1995). However, few studies concentrate on female Chinese consumers. Very minimal research has been done to understand women's changing beliefs about how they perceive and perform their roles in Chinese society. To fill the gap in the existing literature, this study aims to identify women's different beliefs on the traditional and emerging roles performed by women in China. More specifically, this project addresses conceptual and measurement issues related to the study of the female role orientation (FRO) of Chinese women. In this study, "FRO" is defined as the extent of women's attitudes about how to perform their roles as lovers, wives, mothers, employees and citizens of their country. Using this definition, women's beliefs about how to perform these different roles will be explored.

Arnott's feminism scale (1972), which originated from Kirkpatrick's (1936) belief-patterns scale, is an existing instrument for identifying women's different attitudes about how to perform their roles as wives. It is widely used by marketing researchers (Burnett, Amason, and Hunt 1981; Chen et al. 1999; Green and Cunningham 1975; Venkatesh 1980) to study female consumption behavior. The scale, however, was developed in the context of western culture. It is necessary to ask whether an instrument derived from a particular cultural tradition can work equally well in another culture. Are the dimensions of the feminism scale sufficiently robust and culture-free that it can measure attributes of another culture? Two seminal studies of the Chinese female role orientation, both by Sin et al. (2001), have concluded that Chinese women continue to be influenced by their traditional cultural values. The influence of indigenous cultural values on Chinese women suggests that Arnott's feminism scale may not be adequate to study women's consumption behavior.

In addition, some of the new roles that modern Chinese women have adopted remain unexplored by scholars. Women are performing a wide variety of roles in today's world (Belkaoui and Belkaoui 1976). Unlike traditional women, Chinese women today view marriage as an optional life path. They can make their own decisions about whether or not to get married, to establish their career, to be involved in civic life, to accept different kinds of love, to adopt different sexual attitudes, or to

bear children. Given the dramatic changes in women's choices, Arnott's unidimensional feminism scale (1972), which only measures women's attitudes in terms of their career commitment and autonomy, and Sin and Yau's female role orientation scale (2001), which focuses on autonomy and traditional Chinese cultural perspectives, are both unable to capture women's changing beliefs about how to perform their different roles.

Therefore, we propose that FRO should be operationalized as a multidimensional construct rather than a unidimensional construct. In order for the FRO construct to be a reliable and valid scale for measuring women's different attitudes about how to perform their roles in different aspects of their lives, its dimensions will need to truly and adequately reflect Chinese women's attitudes about how to perform their roles as lovers, wives, mothers, employees, and citizens, and toward the role and importance of beauty

1.2 Research Objectives

The primary goal of this study is to develop a valid and reliable multidimensional scale for measuring the female role orientation of Chinese women. This scale will measure how women evaluate various attitudes about how to perform their different roles. We aim at developing an effective measurement that can further

explain and predict women's consumption behavior. We hope this instrument will assist researchers to further investigate how female consumers form their different preferences toward different types of products and services, advertising messages, and advertisement presentation styles. In addition, we also hope this scale can help researchers to study how Chinese female consumers react to different waiting times and respond to different and conflicting consumption situations. According to Woodall (2003), personal values are antecedent to consumption values. As FRO is a construct that reflects women's personal values, we believe that the FRO scale will be, on the one hand, a good predictor for consumption values, and on the other hand, a more basic construct than consumption values to use in explaining a consumer's consumption behaviors.

The existing scale that is used to measure female roles fails to capture the essence of modern Chinese women. Hence, we also propose that a new scale should incorporate both the etic dimensions (dimensions that emerge in all cultures) and the emic dimensions (dimensions that are unique to Chinese culture) of FRO.

1.3 Significance

This study proposes an integrative framework for translating the richness of female's attitude about how to perform their roles into an array of actionable

dimensions. The proposed FRO scale is a significant advance on the tools for classifying female consumers that are available in the current literature. Using this scale, the characteristics of female consumption behavior can be better explained. It is evident that researchers have made considerable progress in enhancing our understanding of the implications for consumption behaviors of the changing roles of women. Studies have shown that accurately identifying female role orientation can offer insights into females' attitudes toward designated products and services. For example, some researchers (Jaffe 1991; Jaffe and Berger 1994; Leigh et al. 1987) have demonstrated that consistency between an advertisement's female role portrayal and the female audience member's role orientation generates more favorable attitudes toward the advertisement and the spokesperson, while inconsistency yields less favorable attitudes. It is clear that the more we understand the changing and emerging roles of women, the better we can tailor marketing strategies toward female consumers (Burnett and Amason 1981). Thus, the FRO scale developed in this paper will help to enhance our understanding of the changing and emerging roles of women in general and of Chinese women in particular.

1.4 Outline

To achieve the objectives mentioned above, this paper reports on the development and validation of a set of multi-dimensional scales for the measurement of FRO using established procedures from the measurement development literature. In chapter 2, we review related literature on the changing roles of women from the field of social psychology and marketing. We then present a hypothesis about the dimensions of FRO in chapter 3. Chapter 4 describes procedures for constructing a new scale and assessment of psychometric properties. Finally, chapter 5 discusses the implications of our research findings and suggests directions for future research.

CHAPTER TWO

BACKGROUND AND LITERATURE REVIEW

2.1 Literature from Psychology

2.1.1 *The conceptual issues of feminism*

Various studies have been done to examine changes in women's roles in the wake of the feminist movement. In psychology, two major streams of thought, or paradigms, have dominated research about women. The first paradigm focuses on the conceptual issues of feminism, i.e., on the development of feminist perspectives or theories. The term "feminism" is used to describe the ideas associated with women's attempt to achieve equal social status with men (Dempewolff 1974). According to Henley and her colleagues (1998), conservatism, liberal feminism, radical feminism, and socialist feminism are the four major feminist theories that have been used to describe and explain the women's movement in the past few decades.

The theory of conservatism suggests that women follow gender arrangements as prescribed by traditional gender principles, that is, that males are dominant, taking on public roles, while females are subordinate and confined to the private realm. In this

perspective, the woman's primary role is to act as a good wife and mother, and her sole responsibility is to serve her family and her husband.

Liberal feminism, on the other hand, grew out of faith in rationality, or reason; a belief that by virtue of their identical reasoning capacities, women and men are equal and essentially the same; and a belief in civil rights, education, and equality of opportunity as assured by law. In this perspective, it is assumed that women should enjoy the right to make their own choices, particularly the choice to have their own social circles and careers.

In the radical feminist perspective, women are defined as a politically oppressed class. Men, rather than capitalism, custom, or biology, are seen to be the oppressors of women. Proponents of radical feminism believe that men, who always treat women as their subordinates, as property, and as reproductive vessels, dominate our society.

Finally, socialist feminism, as its name implies, grows out of a socialist political philosophy. It prioritizes neither class nor gender as the reason for differences between men and women, but argues instead that the roles of women are determined by political considerations. For example, women in China traditionally focused their energies on the household, and serving the community was not a serious concern for them. When the Communist Party came to power in 1949 and launched the movement of women's liberation, however, the slogan that women in China "hold up half of the

red sky” implied that women were normatively treated equally, contributing to the country and assuming responsibilities equal to those of men. In consequence, they were expected to devote themselves to their nation. Women were encouraged to participate in the political system so as to serve the community better. From the socialist feminist perspective, this transformation in Chinese women’s role demonstrates the ways in which politics shapes women’s social lives.

In addition to the above four perspectives, various other feminist theoretical positions exist, including anarcho-feminist, lesbian feminist, eco-feminist, essentialist, global feminist, and postmodern feminist approaches (Henley et al. 1998).

2.1.2 The measurement issues of feminism

Another paradigm of research on women focuses on the measurement issues of feminism, i.e., on the development of scales for measuring women’s role orientation or attitudes toward feminism. More than 50 scales have been developed for the purpose of measuring women’s commitment to various feminist perspectives (Beere 1990). Kirkpatrick (1936), a social psychologist, was the first researcher to develop a belief-patterns scale to measure people’s attitudes toward feminism. The scale developed by Kirkpatrick focuses on women’s attitudes toward their social status,

toward the ideal balance between career and family, and toward men's authority in the home.

Kirkpatrick's belief-patterns scale uses 80 items to divide women into the two general categories of feminist and anti-feminist. Women who use the scale are asked to check (✓) the items that express their thoughts and feelings. If they have strong feelings about any specific items, they are asked to check the items twice. Any item with which they do not agree is to be left blank. Some representative items from Kirkpatrick's scale are listed in Table 2.1.

TABLE 2.1
SELECTED ITEMS OF THE BELIEF-PATTERN SCALE FOR MEASURING
ATTITUDES TOWARD FEMINISM (KIRKPATRICK 1936)

-
- | | |
|-----|--|
| 1. | Women have the right to compete with men in every sphere of economic activity. |
| 2. | As head of the household, the father should have final authority over his children. |
| 3. | Disposal of real property or of common earnings by the husband without the consent of the wife should be forbidden by law. |
| 4. | The unmarried mother is morally a greater failure than the unmarried father. |
| 5. | The influx of women into the business world in direct competition with men should be discouraged. |
| 6. | The relative amounts of time and energy to be devoted to household duties on the one hand and to a career on the other should be determined by personal desire and interests rather than by sex. |
| 7. | A woman who refuses to bear children has failed in her duty to her husband. |
| 8. | There should be a strict merit system of public appointment and promotion without regard to sex. |
| 9. | Women should be guided by men's view of decency in dress. |
| 10. | Women should not be permitted to hold political offices that involve great responsibility. |
| 11. | The wife's desires concerning the number of children she is to bear should be respected by the husband. |
| 12. | A woman who continues to work outside the home after marriage is shirking her |

fundamental duty to home and children.

13. Women should be their own judges of fitness to enter a particular occupation.
 14. Only the very exceptional woman is justified in attempting participation in civic affairs.
 15. Contemporary social problems are crying out for increased social participation by women.
 16. The husband should be regarded as the legal representative of the family group in all matters of law.
 17. Women should be given equal opportunities with men for vocational and professional training.
 18. No woman is too cultured to take responsibility for housework.
 19. Regardless of sex, there should be equal pay for equal work.
 20. To deny mothers the right of equal guardianship of their children is to perpetuate a ridiculous inequality.
 21. There are many words and phrases which are unfit for a woman's lips.
 22. On the average, women should be regarded as less capable of contributing to economic production than are men.
 23. It is insulting to women to have the "obey" clause remain in the marriage service.
 24. A woman should not expect to go to the same places or to have quite the same freedom of action as a man.
 25. A husband has the right to expect that his wife be obliging and dutiful at all times.
 26. A father has no more right to the earnings of offspring than does the mother.
 27. A woman to be truly womanly should gracefully accept chivalrous attentions from men.
 28. It is absurd to regard obedience as a wifely virtue.
 29. An aversion on the part of a wife to sex intimacy with her husband should be repressed for the good of the family.
 30. Women should accept the intellectual limitations of their sex.
 31. Married women should have full control of their persons and give or withhold sex intimacy as they choose.
 32. The married woman should have the same right to make a will that is accorded to her husband.
 33. Women should always take the passive role in courtship.
 34. A daughter in a family should have the same privileges and opportunity as the sons.
 35. It is obviously more logical that a state family allowance be paid to the father than to the mother.
-

Based on Kirkpatrick's seminal work, a number of related scales were developed by Arnott (1972), Beere, King, Beere, and King (1984), Dempewolff (1974), Fassinger (1994), Hyde (1998), Kalin and Tilby (1978), Spence and Helmreich (1972; 1978), and Renzetti (1987). A common feature of these gender role attitudes scales is that the items are drawn from prescribed gender ideologies (Glick and Fiske 1997) and are intended to be used to classify people according to their different attitudes toward their gender roles.

Among these scales, the attitudes toward women scale (AWS; Spence and Helmreich 1972) is the most commonly used measurement by a wide margin (see Table 1.2). It has been used over 300 times since 1978 to measure attitudes toward the rights and roles of women in both family and contemporary society (Beere 1990; Eagly and Mladinic 1989).

Critics have questioned the adequacy and validity of AWS. For example, Spence (1998) argues that the scale is limited in content. Women's role orientation was viewed as a unitary construct by AWS: the scale omits items designed to measure beliefs about women's achievement and attitudes toward gender-relevant political and social issues. Thus, the results of AWS testing should be considered to be solely a measure of the participants' degree of liberal feminism. With the emergence of the other feminist perspectives since the early 1970s, moreover, the content of women's

role orientation may have changed, making the items on the AWS less relevant to the contemporary scene than they were in earlier years. Thus, there is a need to develop a scale that can capture the essence of female role orientation in the twenty-first century.

TABLE 2.2

THE ATTITUDES TOWARD WOMEN SCALE (SPENCE ET AL. 1972, 1997)

1. Swearing and obscenity are more repulsive in the speech of a woman than a man.
2. Under modern economic conditions, with women active outside the home, men should share in household task such as washing dishes and doing laundry.
3. It is insulting to women to have the "obey" clause still in the marriage service.
4. A woman should be as free as a man to propose marriage.
5. Women should worry less about their rights and more about becoming good wives and mothers.
6. Women earning as much as their dates should bear equally the expense when they go out together.
7. Women should assume their rightful place in business and all the professions along with men.
8. A woman should not expect to go to exactly the same places or to have quite the same freedom of action as a man.
9. Sons in a family should be given more encouragement to go to college than daughters.
10. It is ridiculous for a woman to run a locomotive and for a man to darn socks.
11. In general, the father should have greater authority than the other in the bringing up of children.
12. The intellectual leadership of a community should be largely in the hands of men.
13. Economic and social freedom is worth far more to women than acceptance of the ideal of femininity, which has been set up by men.
14. There are many jobs in which men should be given preference over women in being hired or promoted.
15. Women should be given equal opportunity with men for apprenticeship in the various trades.

2.2 Literature from Marketing

In the marketing context, identification of female roles is used to further understand consumer behavior. Previous studies showed that the more accurately we could identify women's roles, the better we could understand female consumption behaviors. Before 1980, marketing researchers and practitioners generally took the view that a woman only played one set of similar roles in her life, as wife, mother, homemaker, and hostess (Davis 1970; Ferber 1974; Kopenen 1960; Wells and Tigert 1971). In this view, the female consumer was simply considered to be the family purchasing agent (Davis 1971; Wilkes 1975).

Due to the growing involvement of women in the job market, however, researchers began to categorize women according to their degree of work involvement. Researchers' findings were enriched when they began to make a distinction between two different kinds of female roles: working versus nonworking housewives. Dissimilarities were found between working and nonworking wives in terms of the types of products purchased (Douglas 1976; McCall 1977; Reynolds, Crask, and Wells 1977, Triki and Wesson 2002), the level of preference for products that could save time and effort (Nichols and Fox 1983; Schaninger and Allen 1981; Schaninger et al. 1993; Stroberg and Weinberg 1980), and the level of preference for advertisement presentation style (Jaffe 1991; Jaffe and Berger 1988; 1994; Kanungo

and Pang 1973; Leigh et al. 1987). For example, Nichols and Fox's study (1983) revealed that time-buying purchasing strategies that are used more often by working-wife families than nonworking-wife families include the purchase of child care, meals away from home, and disposable diapers. Time-saving strategies used by working wives included preparing fewer meals at home, reducing the amount of time spent in household production, and reducing leisure time.

However, researchers' findings about women's patronage behaviors were inconsistent. Strober and Weinberg (1980) found no significant difference in the meal preparation and shopping behavior characteristics of working wives as opposed to housewives, while Roberts and Wortzel (1979) proposed that employment did not have a significant effect on women's shopping behavior. However, McCall (1977) found that working wives shopped for food less often, shopped at different times, and used different food store selection criteria than did housewives. McCall's findings were further elaborated by Jackson, McDaniel, and Rao (1985), who explained the shopping behavior of working wives and proposed that their dislike of food shopping seemed to stem primarily from time considerations. Redman (1980) argued that time considerations may also explain why working wives bought more prepared foods than nonworking wives; Nichols and Fox's finding that working wives tend to purchase meals outside the home (1983) supports this line of argument.

The incompatible findings suggested that simply classifying women in terms of whether they work does not adequately account for the richness of female roles. Thus, some researchers began to look for a scale that incorporated feminist ideology into the process of classifying female consumers. Arnott's feminism scale (1972) became a widely used scale in the marketing context. This ten-item, unidimensional instrument further enriched marketing researchers' definitions of female roles. Women's roles could now be classified as ranging from career-commitment to career-repudiation, while their attitudes toward men could be classified as varying from complete dependency to extreme autonomy (Arnott 1972). Two kinds of roles can be identified for women using the Arnott scale, namely traditionalist and feminist.

Arnott's feminism scale has given marketing researchers additional insight into the behavior of female consumers. Venkatesh's (1980) empirical findings showed that women with different female roles have different kinds of lifestyles. Burnett, Amason, and Hunt (1981) found that traditionalists and feminists use different criteria to evaluate frontline service personnel. Their findings suggest that feminists have a tendency to perceive salesclerks as being their "working sisters." Hence, they have a tendency to be more patient when interacting with salesclerks than do nonfeminists. Nevertheless, feminists will insist on higher standards of appearance, courtesy, and product knowledge than will nonfeminists.

However, most of the studies mentioned in this section were conducted in western countries, especially in the United States. Relatively few studies have been done in other parts of the world, particularly in the People's Republic of China (PRC) which has experienced great economic growth over the last decades. Not until recently have studies of women in Chinese societies begun to be made. For example, in a study comparing the lifestyles of female consumers in Hong Kong, Taiwan, and Mainland China, Tai and Tam (1997) found that women in the three groups mixed traditional and modern values. In another study conducted by Chen et al. (1999) that examined the impact of feminism on family decision making as measured by Arnott's scale, Japanese families were found to be more wife-dominated than Taiwanese families, and feminist orientation was found to have a causal effect on husbands' and wives' relative influence on purchase decisions. Recently, Sin and Yau (2001) found that in addition to the traditional and modern orientations suggested by past FRO studies, orientations such as submissiveness, male dominance, and societal consciousness emerged as factors of importance in a study of women in Mainland China, and that these orientations tend to correlate with various consumption values. That is, Chinese women with different female role orientations tend to give particular product attributes (other than functional attributes) different weight and priority.

These findings suggest that the existing FRO scales such as Arnott's feminism scale (1972) are inadequate for use outside the West because they have failed to conceptualize and measure the richness of FRO in Chinese women (Sin and Yau 2001). In addition, Sin and Yau have highlighted the need for the construction of an inventory that includes both major culture-specific FRO domains and culture-comparable FRO dimensions that can be used as a reliable and valid assessment instrument for Chinese women. By developing a reliable and valid scale for measuring the FRO of Chinese women, this paper takes a step toward the creation of such an inventory.

2.3 The Changing Roles of Women in China

In traditional China, women did not enjoy equal privileges with men. As Li noted, "few societies in history have prescribed for women a more lowly status or treated them in a more routinely brutal way than traditional Confucian China" (1988, 5). The responsibility of women in traditional Chinese society was to supply male heirs (Koo 1985). A typical woman's role was played within the family. In accordance with feudal beliefs, a woman was shackled with ethics called "the three obediences," namely, obedience to her father before marriage, to her husband after marriage, and to her sons after the death of her husband (Su 1996). It was thought to

be natural for her to sacrifice everything for the good of the family. A woman was responsible for serving her husband and bringing up the children of her husband's family. An ideal woman was a virtuous wife and a kind mother, respectful of the hierarchical system within the extended family and devoted to maintaining the traditions of the extended family. Women were often deprived of education and were not regarded as virtuous if they were educated. In short, the traditional norms limited Chinese women to existing within the family and granted them almost no independent life. This traditional role remained firmly entrenched until after the People's Republic of China (PRC) was established in 1949.

The establishment of the PRC opened new avenues for Chinese women who sought emancipation. In line with Marxist ideology, women in the socialist society were emancipated and guaranteed equal rights, employment, and the opportunity to become active in the political arena. Individuals of both genders were supposed to have equal rights to education and to paid employment opportunities. In addition, the communist philosophy created a new, nationalistic model for Chinese women. The slogan that women in China "hold up half of the red sky" implied that women were normatively treated equally, that they contributed to the country and assumed responsibilities equal to men. In return, they were expected to devote themselves to their nation. Their actions and goals were to promote the national welfare. Family

matters took on lower priority compared to national (or communal) tasks. A communist woman maintained a minimal private life. Her undivided attention to the family was replaced by her duties within the society. This communist model (in contemporary Mainland China, the socialistic model) for women's role maintained its momentum during the Cultural Revolution and began to flag only after the country adopted the "Four Modernizations" plan in 1978.

Since 1978, China has instituted some of the most unprecedented economic reforms in history. Among all the recent changes in China, the most important one has been the transformation of its centrally planned economy into a market-oriented one. Under the open-door policy, foreign goods and ideas coupled with foreign investments were allowed to enter China after three decades of prohibition. In the context of these changes, Chinese women were likely to be exposed to western values and ideologies such as materialism, modernism, and feminism. As reflected in a content analysis of women's magazines, women's normative roles in Mainland China are changing dramatically (Ng 1989). Studies show that women in Mainland China are rediscovering their family roles and finding ways to combine them with their social and professional roles.

In summary, as a result of rapid economic changes in China, the economic and social roles of Chinese women have changed dramatically. Chinese women are now

struggling with how to combine their accustomed roles with the new roles created for them by the social and economic changes. It seems likely that the transformations in women's roles have been accompanied by changes in the consumption values that women associate with purchase decisions. Indeed, studies of subjects from the West have suggested that the acquisition of new status symbols may shift women's focus from material goods to personal, intellectual, and cultural modes of expression (Courtney and Lockeretz 1971; Miles 1971; Weiss 1971). However, no similar study has been conducted with Chinese subjects. An understanding of the consumer behavior of women in Mainland China will have important implications for marketers.

CHAPTER THREE:

CONCEPTUALIZING FEMALE ROLE ORIENTATION

3.1 Defining Female Role Orientation

This paper intends to develop a measurement scale that incorporates both etic and emic dimensions of Chinese women's social role. Various feminist perspectives as well as traditional Chinese attitudes toward the female role are proposed to be incorporated into the scale. Considering that women can adopt more than one set of feminist beliefs and that the feminist perspectives may not be mutually exclusive (Spence 1998; Henley et al. 1998; Hyde 1998), the measurement scale developed in this paper does not classify women according to different feminist perspectives. With reference to Beere's (1990) categorization of gender roles and some related literature on women's studies, such as Arnott's (1972) feminism scale, Bankart and College's (1989) motherhood scale, Bargad and Hyde's (1991) feminist identity development scale, Chang's (1999) gender role scale, Chang et al.'s (1997) motivation to achieve scale, Chia et al.'s (2001) and White's (1983) marriage-role attitude scale, Fassinger's (1994) attitudes toward feminism and the women's movement scale, Greenhaus's (1971) investigation of the role of career salience, Hare-Mustin and Broderick's

(1978) motherhood inventory, Hofstede and Bond's (1988) culture free dimensions, Kirkpatrick's (1936) belief-patterns scale, Sin and Yau's (2001) female role orientation scale, Spence and Hahn's (1997) attitudes toward women scale, and Yang's (1986; 1989) traditional and modern characteristic of Chinese people, FRO is defined in this study as the extent of women's attitudes about how to perform their roles as lovers, wives, mothers, employees and citizens of their country. Using this definition, women's beliefs about how to perform these different roles will be explored.

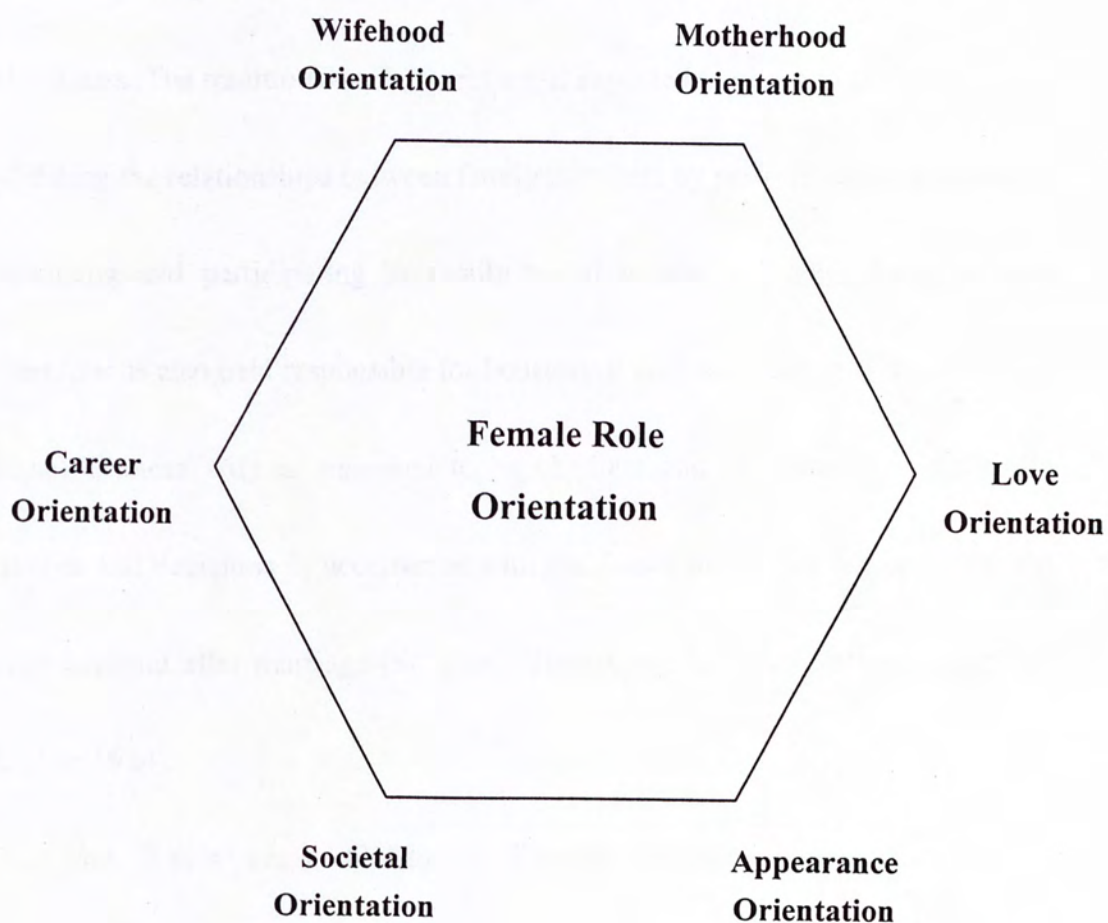
The proposed FRO scale will be operationalized as a scale measuring the multidimensional aspects of FRO. The various dimensions are expected to truly and adequately reflect the extent of modern Chinese women's attitudes about how to perform their roles as lovers, wives, mothers, employees, and citizens, and toward the role and importance of beauty.

3.2 The Components of the Female Role Orientation

Based on the existing literature, the following dimensions are proposed for the FRO scale, namely (1) wifhood orientation, (2) motherhood orientation, (3) career orientation, (4) appearance orientation, (5) societal orientation, and (6) love

orientation (see Figure 3.1). Each dimension will be discussed in the following section.

FIGURE 3.1
THE SIX DIMENSIONS OF FEMALE ROLE ORIENTATION (FRO)



3.2.1 Wifehood orientation

The wifehood orientation dimension is used to evaluate the extend of priority that a woman as a wife gives to her family's needs. Traditionally, the concept of family has been very important in Chinese society. The traditional Chinese belief in gender division emphasizes that the husband should be responsible for external (work/bread-earning related) issues while the wife should be responsible for internal (family) issues. The traditional wife, therefore, is expected to play an important role in consolidating the relationships between family members by performing such activities as organizing and participating in family social events and other family-related activities. She is also held responsible for housework such as cleaning and cooking. A traditional Chinese wife is supposed to be obedient and to follow her husband's preferences and decisions in accordance with the feudal belief that a woman should obey her husband after marriage (Su 1996). Hence, she has very little to say in her family (Lee 1984).

Sin and Yau's study (2001) of Chinese women showed that female submissiveness and male dominance exists in modern Chinese husband-wife relationships to varying degrees. The traditional wife accepts being treated as her husband's asset during her married life and has to follow her husband's decisions. Therefore, she is willing to sacrifice her own interests for the sake of the whole

family's well-being. However, some women nowadays, influenced by liberal and socialist feminism, seek equal status with their husbands at home. They believe that their self-interest is as important as their traditional family responsibilities. Therefore, these modern women may not sacrifice their own interests for their families nor give family issues the highest priority in their lives.

3.2.2 *Motherhood orientation*

Motherhood orientation is used to evaluate a woman's attitude toward her role as a mother in regard to the child-rearing obligation. It measures to what degree a woman feels obligated to be a fully committed mother and whether she derives her sense of achievement from being a mother. Chinese women traditionally have derived public status and social respect as well as a personal sense of self-worth from their role as mothers. They are proud of being identified as mothers. They enjoy the child-rearing process and believe that their success is closely related to the achievements of their children. However, because Chinese women today have much greater opportunities for career development, some may believe that motherhood would limit their freedom and autonomy rather than give them a sense of self-worth. Better-educated women may de-emphasize the importance of the traditional

motherhood role (Smith and Schooler 1978). Hence, modern Chinese women may have varying attitudes toward motherhood.

3.2.3 *Career orientation*

Career orientation is used to evaluate a woman's attitude toward being an employee, or a career woman. Chinese women have been given greater opportunities to receive education and develop their own careers in the past four decades. According to some recent reports, women in China have been achieving steady gains in education and work and have been attaining considerable economic independence for the past four decades. For example, the illiteracy rate for women dropped from 90 percent in 1949 to 30 percent in the mid-1990s (Public Information, 1995). It was reported that more than 50 percent of women aged 18 or above in the mainland of China were part of the active working population.

Education and vocational training enable women to be more independent and competitive. Feelings of mastery and self-worth may motivate women to treat their careers as elements of prime importance in their lives. Earning wages also releases women from relying on their families. Although Tai and Tam's (1997) Asian study about female consumers indicates that Chinese women treat their career achievements and their family achievements as being of equal importance, women have to choose

how much time and energy they should devote to each role according to how highly they value them.

3.2.4 Societal orientation

Societal orientation is used to evaluate how much a woman is willing to participate in political or social activities. It also reflects to what degree a woman wishes to contribute her self to her society. Traditionally, Chinese women focus their energies on the household, and serving the community was not a serious concern for them. However, the women's liberation movement that has occurred in Mainland China since 1949 encourages women to participate in social activities. Influenced by liberal and socialist feminism, some women are fond of playing their roles in social and political activities and expressing opinions about social unfairness.

3.2.5 Appearance orientation

Appearance orientation measures women's attitude toward the importance of their appearance, particularly in reference to the usefulness of beauty in terms of marriage or career achievement. In traditional China, a competent woman should be both externally beautiful and internally accomplished. The internal accomplishments are believed to be far more important than physical appearance. Women's

competency and attractiveness is evaluated in terms of their internal accomplishments. Internal accomplishment refers to personal qualities such as being nice and demonstrating empathy and kindness to others. According to Chinese tradition, good Chinese women should be able to solve problems, treat people nicely, behave in a feminine way, and discipline themselves.

Traditional Chinese women treat their appearance as supplementary to internal accomplishments. Clothing is used only to reflect social status. An old Chinese proverb states, "Human depends on clothing; Buddha depends on a golden coat." In other words, one's dress is a reflection of one's social status. Therefore, Chinese women are traditionally expected to take care with their outer appearance and wear suitable clothes, accessories, and makeup, as well as using proper skin care, hair style, and perfume to project their social status.

However, the contemporary attitude is quite different from the traditional Chinese notion. Most women nowadays solely emphasis on their external beauty. The goal of improving one's appearance is to achieve success in other venues more easily. This attitude is reinforced by the popularity of beauty contests as well as the successful stories of beauty champions. Some women believe that a woman can be greatly assisted by external beauty in achieving her ambitions. Therefore, prettiness is regarded being a more important contributing factor to success.

Given the differences in traditional and modern attitudes toward the role and importance of beauty, we can expect that Chinese women's ideas about beauty might influence their consumer decisions.

3.2.6 Love orientation

Love orientation is used to evaluate a woman's sexual attitudes and her beliefs about her role as lover and about love affairs in general. Traditionally, Chinese women do not have the right to choose their own husbands. Only parents and senior family members are thought to be the right people to choose husbands for young women. They follow the rule that "a wooden door should be matched with a wooden door, while a bamboo door should be paired with a bamboo door." In other words, they seek to marry a woman with someone of similar economic and social status. In this tradition, the choice of a partner is constrained by economic and social conditions, and the acceptability of love affairs is judged by friends and family members. Premarital sexual behavior is strictly prohibited, as traditional Chinese values emphasize the importance of women's virginity before marriage. Confucius opines that sexual behavior is a prohibited issue of discussion.

However, some modern women, influenced by the content of advertisements, television programs, and films, believe that premarital sexual behavior is acceptable.

Furthermore, some previously unacceptable sexual behavior such as homosexuality and “one-night stands” is now accepted in some circles. Love orientation measures women’s attitudes toward love affairs and sexual behavior, noting where they fall between the poles of traditional and modern mores.

CHAPTER FOUR

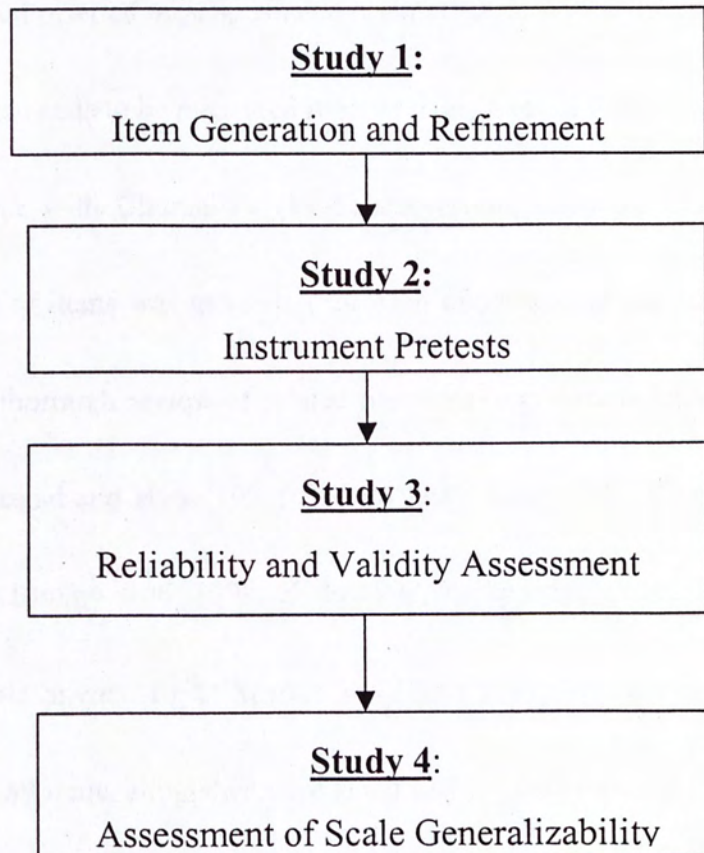
RESEARCH METHODOLOGY

4.1 Overview

This chapter discusses a series of studies of the development of the proposed FRO scale (see Figure 4.1). In study 1, items for measuring FRO were first generated from the relevant literature. Then, in study 2, pilot studies were conducted for item refinement and reduction using student samples. In study 3, the scale reliability and validity of FRO were assessed using Hong Kong women as subjects. In study 4, the stability, generalizability, and validity of the proposed FRO scale were assessed using additional samples of women in Shanghai, Dalian, and Lanzhou. Finally, in study 5, Arnott's feminism scale (1972) and the new FRO scale were compared in terms of their ability to classify Chinese women.

FIGURE 4.1

STUDIES ON SCALE DEVELOPMENT OF FRO



4.2 Study 1: Item Generation and Refinement

As discussed in previous chapters, six dimensions of female role orientation are used in this study, namely wifehood orientation, motherhood orientation, career orientation, societal orientation, appearance orientation, and love orientation. Each of the six dimensions needs to be measured reliably using a multi-item scale.

In compliance with Churchill's (1979) suggestion, once the dimensions were identified, a pool of items was generated for each dimension of the construct. Based on a careful and thorough review of related literature (e.g. Arnott 1972; Bankart and College 1989; Bargad and Hyde 1991; Beere 1990; Chang 1999; Chang et al. 1997; Chia et al. 2001; Henley et al. 1998; Hyde 1998; Kirkpatrick 1936; Sin et al. 2001; Sin and Yau 2001; Spence 1998; Spence and Hahn 1997; White 1983; Yang 1972, 1986, and 1989), 89 items altogether were generated for the proposed six-dimensional FRO scale, grouped as follows: love orientation (15 items), appearance orientation (11 items), wifehood orientation (26 items), motherhood orientation (6 items), societal orientation (14 items), and career orientation (17 items).

In order to prevent the inclusion of redundant, double-barreled, ambiguous, or leading statements (Bearden, Hardesty, and Rose 2001), four female marketing graduate students at a university in Hong Kong served as judges and evaluated the content validity of the items. Each judge was presented with a written definition of

each dimension coupled with a list of the scale items. Judges were then asked to assign each of the 89 items to any of the six dimensions or to a “none of these” category. Forty-eight items were selected consistently by most of the judges. The judges were then interviewed about their interpretations of the inconsistently interpreted items. Based on the interviews, the inconsistently interpreted items were either modified or deleted. Thirty-two modified items were added, and nine items were dropped. A total of 80 related items were prepared for further study.

4.3 Study 2: Instrument Pretests

4.3.1 Pretest 1: Item reduction and reliability testing

To find the best items and reduce the number of items to a manageable list, the 80 items developed in study 1 were taken through a process of scale purification and reliability testing. Data were collected via a survey questionnaire of female undergraduate and diploma students who were attending either day or evening classes at a university in Hong Kong. Respondents were asked to indicate their agreement or disagreement with the 80 FRO statements on a six-point scale (1 = strongly disagree; 6 = strongly agree).

Incomplete questionnaires were dropped. Usable responses were received from 147 female students. All of the respondents whose questionnaires were retained were

aged between 18 and 40. To purify the measurement scale for the FRO, items that correlated negatively with one another (assuming consistent coding) or did not correlate strongly with the sum of the remaining items in their designated dimension were removed. Thirty-three items that highly correlated within their designated dimensions were retained. Following the identification and removal of “problem” items, the reliability of each scale was examined using coefficient alphas (Nunnally 1978). The coefficient alphas for the six dimensions ranged from 0.57 to 0.79.

4.3.2 Pretest 2: Further refinement for scale items

To reduce the likelihood of miscapitalizing during scale purification, another test was conducted on the 33 surviving items. Completed questionnaires were collected from another 350 undergraduate and diploma female business students of another university in Hong Kong.

To purify the measurement scale for FRO, the sample was split into two subsamples (DeVellis 1991). They were randomly split into two halves; the first half was used for development purposes, while the remaining cases were used for validation. Items with low item-to-total correlation within their designated dimensions were deleted. Overall, two items from each of the dimensions of wifehood orientation, career orientation, appearance orientation, and love orientation and one item from the

dimensions of societal orientation were eliminated. The stability of the final measures was then assessed using the validation subsamples (Table 4.1). The coefficient alphas of the six subscales for all the subsamples were above 0.6, which is considered to be acceptable for an exploratory study. The 24 remaining items comprising the subscales are listed in Table 4.2.

Finally, it was necessary to prove that the items could be used to identify the six dimensions when the scale being developed was used to measure women with different educational backgrounds and marital and employment status. Hence, the 24 items were further assessed in study 3.

TABLE 4.1
SCALE RELIABILITIES AND ASSOCIATED STATISTICS

	No. of Items	Development Sample (Group 1: N=175)			Validation Sample (Group 2: N=175)		
		Alpha	Mean	S.D.	Alpha	Mean	S.D.
Wifehood Orientation	4	0.79	3.02	0.96	0.78	3.07	0.98
Love Orientation	4	0.80	3.90	1.10	0.75	3.97	1.02
Motherhood Orientation	4	0.75	3.55	0.88	0.74	3.69	0.86
Societal Orientation	4	0.68	4.38	0.64	0.62	4.50	0.65
Career Orientation	4	0.60	4.28	0.64	0.69	4.30	0.71
Appearance Orientation	4	0.87	4.79	0.63	0.86	4.87	0.69

TABLE 4.2
24 ITEMS OF SUBSCALE OF FRO

Item

Love Orientation

Homosexuality is acceptable
 If two persons love each other, cohabitation is acceptable
 It is acceptable for a woman to have more than one sex partner
 Woman should abstain from sex before marriage

Wifehood Orientation

Looking after the family should be a woman's first priority
 A wife's most important responsibility is to take care of her family
 For a married woman, family is more important than career
 Wife's achievement should not exceed her husband's

Motherhood Orientation

Every woman should be proud of being a mother
 Having children is a woman's greatest achievement
 The most important mission of a woman is raising her children
 Woman's achievement depends on her children's capabilities

Societal Orientation

Everyone should participate in charity work to serve his/her one's society and country
 I am willing to pay more tax to improve elder and weaker's living
 Women should always pay attention to government policies and current affairs
 I am willing to contribute to the future of society

Career Orientation

Every woman should have her own career
 A woman should not resign from work because of her family
 Woman's career should be more important
 I do not mind reducing family time for work

Appearance Orientation

Good appearance helps in career development
 It is easier to be accepted with beautiful appearance
 People with beautiful face are easier to get other people's recognition
 Good-looking people can do things with less effort

4.4 Study 3: Reliability and Validity Assessment

4.4.1 Sample and data collection

A third study was conducted by personal interview using street intercept targeting of Chinese women aged 18 or above living in Hong Kong. The data in Hong Kong was collected with respect to Hong Kong's population distribution in terms of age, income, and living location. These three criteria were adopted to separate subjects into homogeneous groups sharing similar characteristics. The respondents were selected randomly according to an established quota for age, income, and living location. A private research company was commissioned to collect the data. A total of 312 completed questionnaires were collected.

The demographic distribution of the respondents in this study is shown in Table 4.3. A distribution analysis of the respondents indicates that the sample includes a fairly broad cross-section of subjects with regard to age, marital status, educational attainment, personal monthly income, and employment status.

TABLE 4.3

SUMMARY OF DEMOGRAPHIC CHARACTERISTICS OF HONG KONG RESPONDENTS

Demographic variables	Hong Kong sample (%) N = 312
Age	
18-20	10.3
21-30	20.2
31-40	29.2
41-50	26.9
51 or above	13.5
Marital status	
Single	37.2
Married	56.7
Divorced	5.4
No. of Children	
None	42.6
One	17.0
Two	28.5
Three	8.3
Four or above	3.5
Educational attainment	
Primary school or below	17.3
Secondary school incomplete	18.6
Secondary complete	43.6
Post secondary	10.6
University or above	9.9
Employment status	
Unemployed	41.6
Employed	58.4
Monthly Personal Income	
None	46.5
HK\$5,000 or below	12.5
HK\$5,001-10,000	21.2
HK\$10,001-15,000	12.8
HK\$15,001-20,000	3.2
HK\$20,001-30,000	2.6
HK\$30,001-40,000	1.0
HK\$50,000 or above	0.3

4.4.2 Dimensionality assessment

After the sample distribution was examined, the dimensionality of the FRO scale was assessed. Following the procedure employed by Jaworski and Kohli (1993), the correlation matrix of the 24 items capturing the dimensions of wifeness orientation, motherhood orientation, career orientation, societal orientation, love orientation, and appearance orientation was used as input for confirmatory factor analysis. In this study, two measurement models were tested and compared:

Model 1 (one-factor model): FRO was conceptualized as a unidimensional construct with six subdimensions. The covariance among the 24 items can be accounted for by a single factor (see Figure 4.2).

Model 2 (six correlated factors model): FRO was conceptualized as a multidimensional construct. Covariation among the items can be accounted for by the six restricted first-order factors, with each factor representing a distinct dimension of FRO and each item being reflective of only a single dimension. The six factors are correlated (see Figure 4.3).

FIGURE 4.2
MODEL 1 OF FRO SCALE

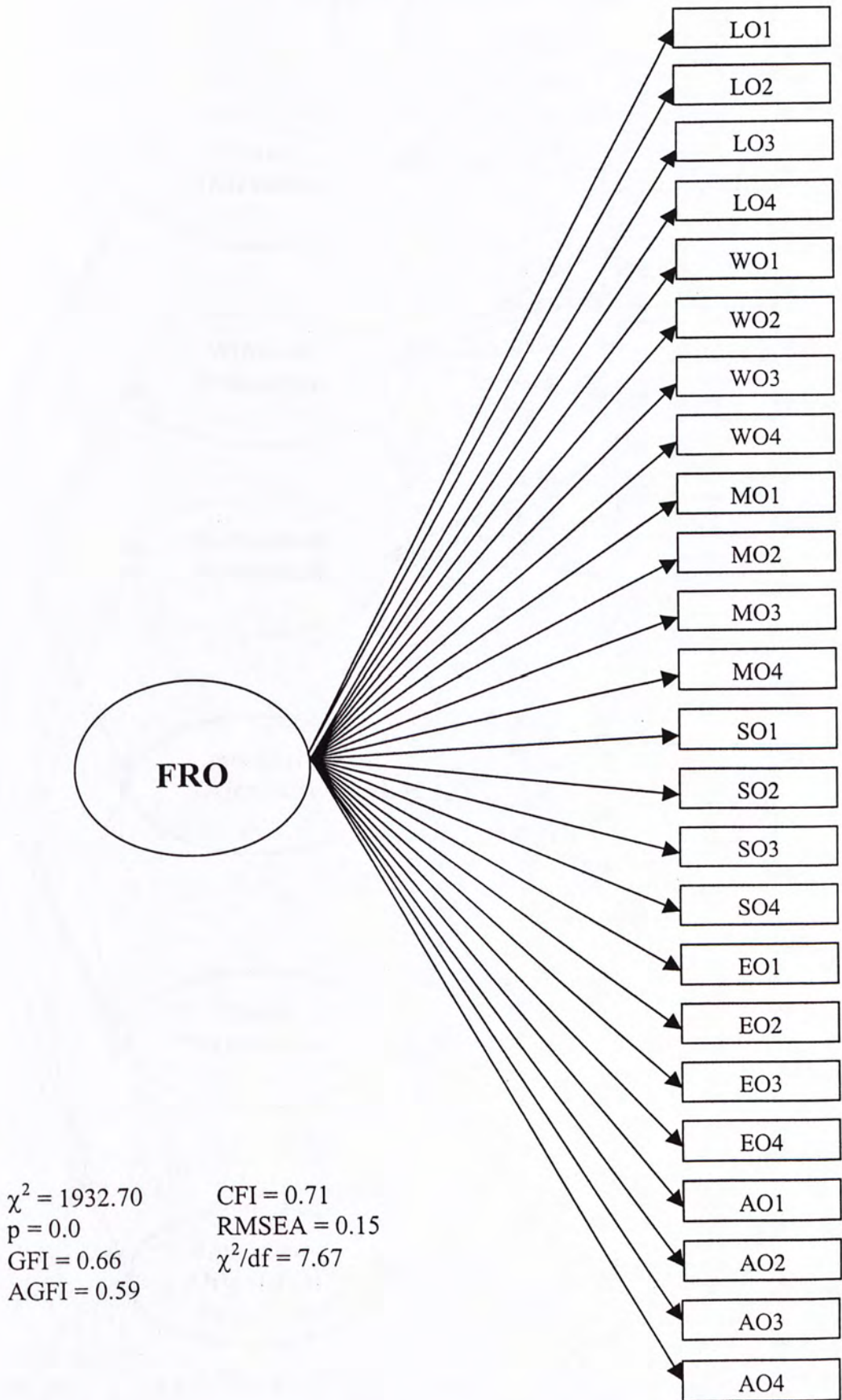
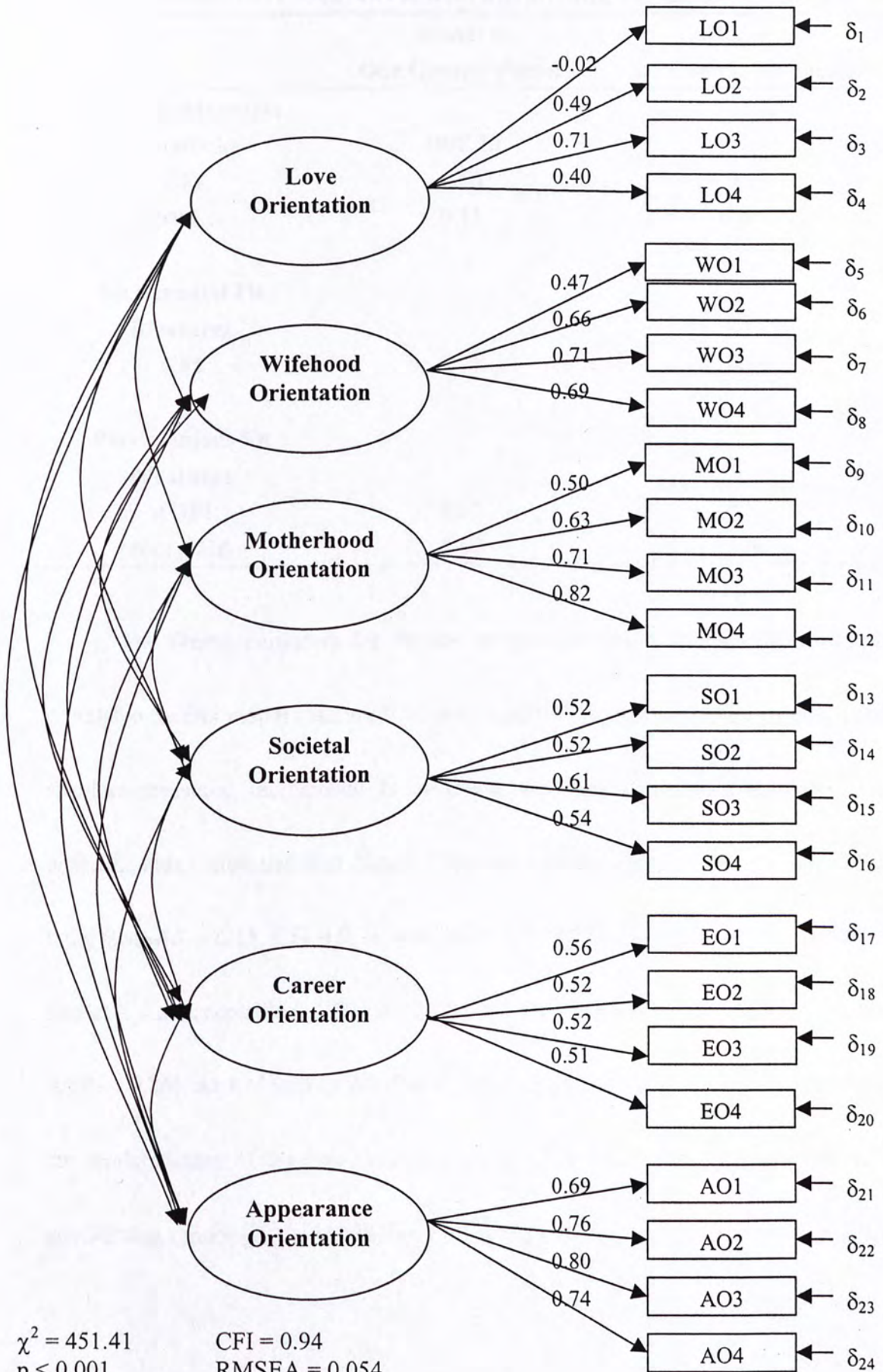


Figure 4.3
MODEL 2 OF FRO SCALE



$\chi^2 = 451.41$
 $p < 0.001$
 GFI = 0.89
 AGFI = 0.86

CFI = 0.94
 RMSEA = 0.054
 $\chi^2/df = 1.90$

TABLE 4.4
CONFIRMATORY FACTOR ANALYSIS MODEL FIT COMPARISONS

	Model 1: One General Factor	Model 2: Six Correlated Factors
Absolute Measures		
χ^2 Statistics	1932.70	451.41
GFI	0.66	0.89
RMSEA	0.15	0.054
Incremental Fit Measures		
CFI	0.71	0.94
Parsimonious Fit Measures		
AGFI	0.59	0.86
NC(χ^2/df)	7.67	1.90

The fitness indicators for the two models are shown in Table 4.4. The six correlated factors model (Model 2) outperformed the one-factor model (Model 1) on absolute measures, incremental fit measures, and parsimonious fit measures. The entire fit index indicated that Model 1 was an unfitted model ($\chi^2/\text{df} = 7.67$, GFI = 0.66, RMSEA = 0.15, CFI = 0.71, and AGFI = 0.59). However, the overall fitness of Model 2 was acceptable ($\chi^2/\text{df} = 1.90$, GFI = 0.89, RMSEA = 0.054, CFI = 0.94, and AGFI = 0.86). As RMSEA is less than 0.06 and the chi-square is less than three times the model degree of freedom, the six correlated factors model was indicated as a good-fitting model (Bollen 1990; Hu et al. 1992). Hence, the results shown in Table

4.4 suggest that the six correlated factors model provides the better representation of the data.

In order to improve the fitness of Model 2, items that failed to represent the factors to which they were originally assigned or items that loaded on more than one factor (indicated by large modification indices) were deleted. Using these criteria, four items were deleted. Two of them were deleted because their variances extracted were too low to represent their respective designated love and wifehood dimension. And the other two items, that should only represent their respective motherhood and career dimension, were also deleted because they showed high correlation with other dimensions. Subsequently, the number of items representing FRO was reduced from 24 to 20. Refitting Model 2 resulted in considerable improvement of fit ($\chi^2/df = 1.765$, GFI = 0.92, RMSEA = 0.049, CFI = 0.95, NFI = 0.90). The confirmatory factor analysis led to the elimination of four measurement indicators.

To further inspect how these six dimensions correlated with one another, a correlation analysis was conducted. All six dimensions showed a different extent of correlation, shown in Table 4.5. As expected, marital orientation significantly correlated with motherhood orientation, while career orientation significantly correlated with societal and appearance orientation. However, some interesting correlations were also found. For example, motherhood orientation correlated with

societal orientation, and societal orientation correlated with appearance orientation.

These interesting findings may need to be further investigated by researchers.

TABLE 4.5

CORRELATIONS AMONG THE SIX DIMENSIONS OF FRO

	Love Orientation	Marital Orientation	Motherhood Orientation	Societal Orientation	Career Orientation	Appearance Orientation
Hong Kong sample (N = 312)						
Love Orientation	1.000					
Marital Orientation	-0.038	1.000				
Motherhood Orientation	-0.153 ^a	0.568 ^a	1.000			
Societal Orientation	0.091	0.086	0.173 ^a	1.000		
Career Orientation	0.191 ^a	-0.070	0.023	0.340 ^a	1.000	
Appearance Orientation	0.147 ^a	0.230 ^a	0.288 ^a	0.327 ^a	0.260 ^a	1.000

a: Statistical significant at 0.01 level

TABLE 4.6
SUMMARY OF CONFIRMATORY FACTOR ANALYSIS RESULTS FOR
THE REFINED SIX-FACTOR CORRELATED MODEL (STUDY 3)

Item	Factor Loading (λ)
<i>Factor 1: Love Orientation</i>	
Homosexuality is acceptable	0.35
If two persons love each other, cohabitation is acceptable	0.54
It is acceptable for a woman to have more than one sex partner	0.51
<i>Factor 2: Wifehood Orientation</i>	
Looking after the family should be a woman's first priority	0.68
A wife's most important responsibility is to take care of her family	0.72
For a married woman, family is more important than career	0.69
<i>Factor 3: Motherhood Orientation</i>	
Every woman should be proud of being a mother	0.49
Having children is a woman's greatest achievement	0.71
The most important mission of a woman is raising her children	0.84
<i>Factor 4: Societal Orientation</i>	
Everyone should participate in charity work to serve his/her one's society and country	0.54
I am willing to pay more tax to improve elder and weaker's living	0.52
Women should always pay attention to government policies and current affairs	0.60
I am willing to contribute to the future of society	0.53
<i>Factor 5: Career Orientation</i>	
Every woman should have her own career	0.63
A woman should not resign from work because of her family	0.53
I do not mind reducing family time for work	0.43
<i>Factor 6: Appearance Orientation</i>	
Good appearance helps in career development	0.69
It is easier to be accepted with beautiful appearance	0.74
People with beautiful face are easier to get other people's recognition	0.73
Good-looking people can do things with less effort	0.80

4.4.3 *Item analysis and reliability assessment*

The results of the confirmatory factor analysis needed to be further validated. Scale reliability was first examined. Coefficient alpha was used to estimate the internal consistency of each dimension. Based on the data from study 3, the resulting reliabilities were as follows: 0.738 for wifehood orientation; 0.713 for motherhood orientation; 0.832 for appearance orientation; 0.520 for love orientation; 0.631 for societal orientation, and 0.531 for career orientation. The coefficient alphas for these six dimensions are all above 0.5, which is considered to be acceptable for an exploratory study (Nunnally 1978).

4.4.4 *Validity assessment*

4.4.4.1 *CONVERGENT VALIDITY*

Convergent validity refers to the degree of agreement between two or more measures of the same construct. We examined the convergent validity of the refined six correlated factors model of FRO scale using two approaches. First, we followed Hui, Au, and Fock's (2004) procedure of examining the λ coefficients of each item of the refined Model 2, which was proved to be a good-fitting model. The results (Table 4.6) indicated that all but one item's λ coefficients were significant ($P < 0.01$) and above the 0.4 level. As the λ coefficient of the exceptional item is 0.35, which is

comparatively quite close to 0.4, this result may suggest that all the items fit nicely into the construct.

In an effort to provide further evidence of the convergent validity of the proposed FRO scale, we used another procedure employed by Bagozzi (1993) to assess the convergent validity of the FRO scale. Correlation analyses were conducted among the six components of the scale on the following six measures of female role, as reported by the respondents: (1) the extent of being a woman who emphasizes the importance of family; (2) the extent of being a woman who emphasizes the importance of outer appearance; (3) the extent of being a woman who emphasizes the importance of concern with social issues; (4) the extent of being a woman who is a traditional mother; (5) the extent of being a woman who emphasizes the importance of her career; (6) the extent of being a woman who emphasizes the importance of love. These six variables were measured using a six-point Likert Scale ranging from 1 (strongly disagree) to 6 (strongly agree). Convergent validity would be demonstrated if (i) wifehood orientation was positively and significantly correlated with self-reported measures of being a woman who emphasized the importance of family; (ii) appearance orientation was positively and significantly correlated with self-reported measures of being a woman who emphasized the importance of outer appearance; (iii) societal orientation was positively and significantly correlated with

self-reported measures of being a woman who emphasized the importance of concern with social issues; (iv) motherhood orientation was positively and significantly correlated with self-reported measures of being a woman who was a traditional mother; (v) career orientation was positively and significantly correlated with self-reported measures of being a woman who emphasized the importance of her career; and (vi) love orientation was positively and significantly correlated with self-reported measures of being a woman who emphasized the importance of love.

Table 4.7 shows the correlation coefficients between the dimensions of FRO and the six self-reported measures of female roles. Motherhood, societal, career, and appearance orientation had the highest correlations with their respective self-reported statements. The self-reported statement about family also significantly correlated with both wifhood and motherhood dimensions. This can be seen as a reasonable result, as participants perceived both wifhood and motherhood to be concepts related to family. An insignificant negative relationship between the self-reported statement about love and the measure of love orientation may have been due to different perspectives emphasized in the self-reported statement and in the construct. Women may treat the love dimension as a kind of attitude toward sexual behavior, while the self-reported statement concerned the importance of love, which may be independent or different from sexual attitudes.

TABLE 4.7

CORRELATIONS BETWEEN FEMALE ROLE ORIENTATIONS AND SELF-REPORTED FEMALE ROLE

Hong Kong sample Self-reported female role						
Scales	Love is important to me	Family is important to me	Being a Conventional Mother is important to me	Social issues are important to me	Career is important to me	Beauty is important to me
Love Orientation	-0.003	-0.117 ^b	-0.177 ^a	-0.008	0.148 ^a	0.121 ^b
Wifehood Orientation	0.294 ^a	0.407 ^a	0.500 ^a	0.036	-0.100	0.134 ^b
Motherhood Orientation	0.300 ^a	0.457 ^a	0.549 ^a	0.068	-0.085	0.164 ^a
Societal Orientation	0.003	0.206 ^a	0.121	0.479 ^a	0.199 ^a	0.098
Career Orientation	-0.099	-0.012	-0.074	0.170 ^a	0.349 ^a	0.197 ^a
Appearance Orientation	0.131 ^b	0.154 ^a	0.184 ^a	0.183 ^a	0.101	0.214 ^a

a: Statistically significant at 0.01 level

b: Statistically significant at 0.05 level

4.4.4.2 DISCRIMINANT VALIDITY

Discriminant validity indicates the degree to which measures of conceptually distinct constructs differ. A test of discriminant validity was implemented using the criteria recommended by Fornell and Larcker (1981) in which the pairwise correlations between factors obtained from the six correlated factors model were compared with the variance-extracted estimates for the constructs that make up each possible pair. Evidence of discriminant validity can be found when both variance-extracted estimates exceed the square of the correlation between the factors making up each pair. In Table 4.8, the results of all 15 pairwise comparisons can be found; they demonstrate the discriminant validity of the proposed FRO scale.

TABLE 4.8

COMPARISON BETWEEN FACTOR CORRELATION AND VARIANCE EXTRACTED

	Square of Correlation	Variance Extracted
Hong Kong sample		
1. Love Orientation & Wifehood Orientation	0.00	0.223 & 0.487
2. Love Orientation & Motherhood Orientation	0.024	0.223 & 0.483
3. Love Orientation & Societal Orientation	0.008	0.223 & 0.300
4. Love Orientation & Career Orientation	0.036	0.223 & 0.290
5. Love Orientation & Appearance Orientation	0.022	0.223 & 0.555
6. Wifehood Orientation & Motherhood Orientation	0.323	0.487 & 0.483
7. Wifehood Orientation & Societal Orientation	0.007	0.487 & 0.300
8. Wifehood Orientation & Career Orientation	0.005	0.487 & 0.290
9. Wifehood Orientation & Appearance Orientation	0.053	0.487 & 0.555
10. Motherhood Orientation & Societal Orientation	0.030	0.483 & 0.300
11. Motherhood Orientation & Career Orientation	0.001	0.483 & 0.290
12. Motherhood Orientation & Appearance Orientation	0.083	0.483 & 0.555
13. Societal Orientation & Career Orientation	0.116	0.300 & 0.290
14. Societal Orientation & Appearance Orientation	0.107	0.300 & 0.555
15. Career Orientation & Appearance Orientation	0.068	0.290 & 0.555

Nomological validity refers to the extent to which measures of a construct that is expected to relate with measures of other constructs, all embedded in a theoretical network of relationship (Churchill 1995). Previous studies of values and behaviors indicate that there is a linkage between personal values, attitudes, and behavior. It has been shown that an individual's value differences are related to significant differences in a variety of attitudinal and behavioral outcomes of purchasing behavior (Allen 2001; Erden et al. 1999; Homer and Kale 1988; Shim and Eastlick 1998). The proposed FRO scale is a measurement of women's beliefs relating to their personal values, while consumer choice is regarded to be a function of multiple consumption values (Sheth, Newman, and Gross 1991a, 1991b). Thus, the proposed FRO scale should be expected to correlate with some relevant consumption values. Consumption values were used to test the nomological validity of the FRO scale.

Based on previous literature (Nichols and Fox 1983; Sweeney and Soutar 2001; Sin et al. 2001; Triki and Wesson 2002), eight consumption values and their respective items were generated. Four consumption values—price value, emotional value, social value and quality value—were adopted and modified from Sweeney and Soutar's (2001) study, while family value, environmental protection value, and social status value were adopted and modified from Sin et al.'s (2001) study. Then, based on Nichols and Fox's (1983) as well as Triki and Wesson's (2002) findings, the

consumption value of efficiency enhancement was proposed. Hence, in the same questionnaire used for study 3, participants were also asked to evaluate eight different consumption values—namely efficiency enhancement value, emotional value, price value, social value, quality value, family value, environmental protection value, and social status value—in regard to 29 items. Women’s attitudes toward these items were captured in a six-point Likert Scale ranging from 1 (extremely unimportant) to 6 (extremely important).

A principal component factor analysis with varimax rotation was used to verify the dimensions of consumption values. The analysis provided a six-factor solution (eigenvalues greater than 1.0). Six statements that had a commonality less than 0.3 were eliminated. The remaining 23 statements accounted for 71.1 percent of the total variance explained. Table 4.9 shows the emerging factors of consumption values with factor loadings. Following a close inspection of the items loading on each factor, the six factors were labeled as “social value,” “price value,” “family value,” “efficiency enhancement value,” “environmental protection value,” and “quality value.” The reliability of these six factors was assessed using Cronbach’s alpha coefficient, and the results were found to be in the range of 0.739-0.920. The reliability of the scales was considered to be acceptable for further analysis (Nunnally 1978).

TABLE 4.9
SUMMARY OF FACTOR ANALYSIS OF CONSUMPTION VALUES
(STUDY 3)

Item	Factor Loading
<i>Factor 1: Social Value</i>	
(20.9% of variance explained; alpha coefficient = 0.920)	
Can increase one's attractiveness	0.86
Can reveal one's personal taste	0.83
Makes you more likeable	0.80
Makes oneself more impressive	0.80
Easier for people to accept	0.78
Gives you personal identity	0.76
Can reflect one's status	0.75
<i>Factor 2: Price Value</i>	
(11.2% of variance explained; alpha coefficient = 0.771)	
Economical	0.80
Reasonable price	0.79
Price is cheap	0.71
Worth the money	0.59
<i>Factor 3: Family Value</i>	
(11.1% of variance explained; alpha coefficient = 0.880)	
Leads to closer family relationship	0.84
Improves family feelings for each other	0.79
Improves family relationship	0.79
<i>Factor 4: Efficiency Enhancement Value</i>	
(10.7% of variance explained; alpha coefficient = 0.798)	
Efficient allocation of time	0.75
Can save time	0.70
Can improve time usage	0.69
Allows you to multi-task	0.66
<i>Factor 5: Environmental Protection Value</i>	
(9.9% of variance explained; alpha coefficient = 0.792)	
Uses recycled materials	0.79
Uses less harmful materials	0.78
Uses materials that are environmentally friendly	0.75
<i>Factor 6: Quality Value</i>	
(7.3% of variance explained; alpha coefficient = 0.739)	
Can be trusted	0.85
Quality meets international standard	0.72

Based on previous literature about female roles and traditional Chinese cultural values (Thompson, Pollio, and Locander 1994; Jackson, McDaniel, and Rao 1985; Nichols and Fox 1983; Redman 1980; Yang 1989), the following hypothesized relationships were expected:

Women who placed higher value on motherhood and wifehood orientation were expected to value their relationships with their family members (Yang 1989). They were expected to pay more attention to the well-being of their family members and to try their best to make good use of their available resources. Hence, they were predicted to always be interested in seeking good deals during the consumption process (Thompson, Pollio, and Locander 1994). This reasoning led to four hypotheses:

(H1a) Women with higher values in the dimension of motherhood orientation would concern themselves more with price value.

(H1b) Women with higher values in the dimension of motherhood orientation would concern themselves more family value.

(H2a) Women with higher values in the dimension of wifehood orientation would concern themselves more with price value.

(H2b) Women with higher values in the dimension of wifehood orientation would concern themselves more with family value.

Women who placed higher value on career orientation were expected to be working or career women. They were expected to spend most of their time in the workplace while earning satisfactory personal income. As they may have limited spare time for themselves, they were predicted to need products or services to enhance their working efficiency (Jackson, McDaniel, and Rao 1985; Nichols and Fox 1983; Redman 1980). In addition, working women are facing more requests, especially from their employers, to perform well in their work. As they are often asked by others to do their jobs well, it would be natural for them to be more concerned about products and services' quality. Hence, compared with nonworking women, working women were also predicted to prefer quality products. These assumptions led to H3a and H3b hypothesis:

(H3a) Women with higher values in the dimension of career orientation would concern themselves more with product quality value.

(H3a) Women with higher values in the dimension of career orientation would concern themselves more with efficiency enhancement value.

Appearance orientation refers to women's attitude toward the usefulness of beauty in terms of marriage or career achievement. Women who place higher value on appearance orientation were expected to consider their outer beauty very important and to believe that the better their appearance, the better they would be treated.

Therefore, they were expected to be more interested in products or services that could enhance their beauty and popularity. These assumptions led to a fourth hypothesis:

(H4) Women with higher values in the dimension of appearance orientation would concern themselves more with social value.

Women who placed higher value on love orientation indicated their more liberal attitudes toward sexual behavior and love affairs. Their need to be loved was expected to be higher than that of others. These assumptions led to a fifth hypothesis:

(H5) Women with higher values in the dimension of love orientation would concern themselves more with social value.

Women who placed higher value on the dimension of societal orientation showed that they pay more attention to social issues. They were expected to concern themselves with the welfare of the whole society and to look forward to contributing to their society. This reasoning led to a sixth hypothesis:

(H6) Women with higher values in the dimension of societal orientation would concern themselves more with environmental protection value.

Correlation analysis was used to examine the hypothesized relationships. As shown in Table 4.10, evidence of the nomological validity of the proposed FRO scale exists, as the hypothesized relationships between the FRO dimensions and the consumption values are shown to be valid.

In a nutshell, there is evidence of convergent validity, discriminant validity, and nomological validity, and thus the findings support the validity of the refined six correlated factors model of the proposed FRO scale.

TABLE 4.10
CORRELATIONS BETWEEN CONSUMPTION VALUES AND THE SIX DIMENSIONS OF FRO

	Social Value	Price Value	Family Value	Efficiency Enhancement Value	Environmental Protection Value	Quality Value
Hong Kong sample (N = 312)						
Love Orientation	0.128 ^b	0.092	0.054	0.147 ^a	0.135 ^b	0.093
Wifehood Orientation	0.224 ^a	0.167 ^a	0.148 ^a	0.072	0.020	-0.057
Motherhood Orientation	0.280 ^a	0.232 ^a	0.134 ^b	0.086	0.081	0.095
Society Orientation	0.078	0.1	0.076	0.309 ^a	0.224 ^a	0.222 ^a
Career Orientation	0.080	0.159 ^a	0.078	0.204 ^a	0.207 ^a	0.238 ^a
Appearance Orientation	0.324 ^a	0.247 ^a	0.222 ^a	0.259 ^a	0.186 ^a	0.266 ^a

a: Statistically significant at 0.01 level

b: Statistically significant at 0.05 level

4.5 Study 4: Assessment of Scale Generalizability

Even though the proposed factorial structure is a good fit with the data, the results could be specific to the sample. One of the major limitations of study 3 is that data in this study were only obtained from Chinese women in Hong Kong. Although it can be said that the sample represents a cross-section of Hong Kong's female population, the generalizability of the FRO scale to women in Mainland China is still questionable. To provide evidence of the generalizability of the proposed FRO scale, a replicated study on a wider scale with Chinese women from other cities of PRC was essential. Thus, study 4, in which confirmatory factor models were examined using responses obtained from another sample of 908 Chinese women from three different cities of Mainland China, was conducted.

4.5.1 *Sample and data collection*

Study 4 examines the FRO model across three different cities (Shanghai, Dalian, and Lanzhou) in Mainland China. Although past studies of China tend to treat it as a country with homogeneous characteristics across regions or cities (e.g., Tse et al. 1989), many scholars have argued that China is a culturally heterogeneous country characterized by diversity in terms of cultural values, pace of economic development, spoken language, degree of acculturation, lifestyle, and belief system (Schmitt 1977;

Sin and Ho 2001; Swanson 1989). Hence, Shanghai, Dalian, and Lanzhou, cities that vary socioeconomically, were selected in order to provide sample characteristics of sufficient variability. A comparison of these three cities in terms of population, location, industrialization, education and economic index is illustrated in Table 4.11.

TABLE 4.11
SUMMARY OF HISTORIC, GEOGRAPHIC, ECONOMIC, AND EDUCATIONAL
CHARACTERISTICS OF THE THREE CITIES OF PRC

Characteristics	Shanghai (East Central)	Dalian (Northeast)	Lanzhou (Northwest)
Population	13,271,400	5,546,100	2,965,100
Location			
Coastal or inland location	Coastal	Coastal	Inland
Foreign commercial and trading center over the past century	Yes	Yes	No
Industrialization			
1980 economic reform (one of the 14 open cities)	Yes	Yes	No
Level of industrial output in the region (1990)	High	Moderate	Low
Increase in output per capita (1984-1990)	High	Moderate	Low
Education			
Education emphasis (students enrolled in college per 1000 inhabitants)	7.5	1.6	7.4
Economic Index			
GDP (0,000)	49508400	12356400	3487465
Regional Saving (0,000)	30018900	8389826	3435122
Average Personal Annual Income (RMB)	21,781	13,492	10,511

Source: State Statistical Bureau 2001, 1992.

Descriptively, Shanghai is an eastern coastal city, Dalian is situated in the Northeast of China, and Lanzhou is an inland city situated in the Northwest. Shanghai and Lanzhou present a coastal-inland contrast. Shanghai enjoys the highest industrial output and output per capita in the nation, while Lanzhou is low in both. Dalian's economic condition falls between that of Shanghai and Lanzhou, and it has the shortest history of educational development. Thus, attempts to conduct research on FRO in these three cities undoubtedly provide a direct test of the generalizability of the FRO scale in different subcultures.

The survey was conducted by personal interview using street intercept targeting of women aged 18 or above. The age range was selected as the same as the sample in Hong Kong for the purpose of making comparisons. A similar sampling method was also adopted. A private research company was commissioned to collect the data. The demographic characteristics of participants are shown in Table 4.12.

TABLE 4.12
SUMMARY OF DEMOGRAPHIC CHARACTERISTICS OF RESPONDENTS

Demographic variables	Shanghai sample (%)	Dalian sample (%)	Lanzhou sample (%)
Sample Size	301	303	304
Age			
18-20	6.6	7.6	7.2
21-30	23.6	25.4	26.6
31-40	24.3	27.1	32.2
41-50	30.6	26.1	20.7
51 or above	15	13.9	13.2
Marital status			
Single	28.9	30.7	27.0
Married	69.8	68.6	68.1
Other	1.3	0.6	5.0
No. of Children			
None	34.9	38.9	33.6
One	57.1	55.4	57.6
Two	6.3	4.6	5.3
Three	1.0	0.7	1.3
Four or above	0.7	0.3	2.3
Educational			
Primary school or below	1.3	1.7	2.0
Secondary school incomplete	1.3	4.3	3.9
Secondary complete	41.5	46.2	40.5
Post secondary	34.9	34.7	40.1
University or above	20.9	13.2	13.5
Employment status			
Unemployed	36.9	37.7	20.3
Employed	63.1	62.3	79.7
Monthly Personal Income			
None	15.3	21.1	8.6
Below RMB 500	3.7	11.9	21.4
RMB 501-1000	22.9	44.6	41.4
RMB 1001-1500	14.6	14.5	22.4
RMB 1501-2000	16.3	5.6	4.9
RMB 2001+	27.2	2.3	1.3

4.5.2 Factor structure comparison

The generalizability of the proposed FRO scale was then assessed by (a) specifying a confirmatory factor analysis model with the FRO scale using the refined six correlated factors model created from the Hong Kong sample, and (b) examining the extent to which this specification is invariant across the samples from the three cities of Mainland China and from the Hong Kong sample. In this analysis, the three cities were compared with Hong Kong individually. Sequential testing procedures for examining increasingly restrictive forms of variance were adopted (Cheung and Rensvold 1999; Mullen 1995; Singh 1995). In the model used (Model A), the factor pattern was set to be invariant across the samples from the cities in Mainland China and from Hong Kong. Fitting this model to the covariance matrices of the three pairs of samples produced a satisfactory fit (Table 4.13). Hence, we can conclude that the same factor structure of FRO is mapped in all of the samples. This result allowed us to perform increasingly restrictive analyses to establish similarities and differences in the samples. Model B further constrains factor loadings to be equal across the three pairs of samples. This model is obtained by adding the specification of the equality of factor loadings to Model A. As this model is nested in Model A, a chi-square difference can be computed to test formally the hypothesis of equal loadings. The test shows that the pairwise chi-square comparison between Hong Kong and Shanghai

($\chi^2_d(14) = 15.62$, $p < 0.1$) is insignificant. However, there is significant chi-square difference in pairwise comparison between Hong Kong and Lanzhou ($\chi^2_d(14) = 29.06$, $p < 0.01$) as well as between Hong Kong and Dalian ($\chi^2_d(14) = 48.66$, $p < 0.005$). In other words, the Hong Kong and Shanghai samples share the same factor loading. Nevertheless, the significant decrease in chi-square in the pairwise comparison between Hong Kong and Lanzhou as well as that between Hong Kong and Dalian means that the hypothesis of same factor loading was not supported. But when we examined the fit index for these two pairs of comparison, they provided a fairly fit indication. We then tested whether the error variances were equal across the samples (Model C). The chi-square difference test demonstrates that error variances were not equal for the three pairs of samples: $\chi^2_d(20) = 60.44$, $p < 0.005$ for the comparison between Hong Kong and Lanzhou; $\chi^2_d(20) = 376.82$, $p < 0.005$ for the comparison between Hong Kong and Dalian; $\chi^2_d(20) = 245.15$, $p < 0.005$ for the comparison between Hong Kong and Shanghai.

The above data leads to the conclusion that the proposed FRO scale can be generalized to the extent that the factor pattern is invariant between the four cities. When the factor loadings are constrained, Hong Kong and Shanghai share the same factor loading for the measurement. The other two pairs, i.e. Hong Kong and Dalian and Hong Kong and Lanzhou, illustrate fairly fitted models when the factor loadings

are constrained but show a significant increment of chi-square. A further test on error variances showed that the four cities had different error variance.

TABLE 4.13
PAIRWISE COMPARISON OF FACTURE STRUCTURE BETWEEN HONG KONG AND THREE CITIES IN CHINA

	Hong Kong and Lanzhou			Hong Kong and Dalian			Hong Kong and Shanghai		
	Model A	Model B	Model C	Model A	Model B	Model C	Model A	Model B	Model C
χ^2	635.31	664.37	724.81	637.83	686.49	1063.31	612.2	627.82	872.97
Degree of Freedom (df)	331	345	365	331	345	365	331	345	365
df / χ^2	1.92	1.93	1.99	1.93	1.99	2.91	1.85	1.82	2.39
χ^2 Difference		29.06 ^a	60.44 ^a		48.66 ^a	376.82 ^a		15.62	245.15 ^a
RMSEA	0.053	0.054	0.057	0.054	0.056	0.08	0.053	0.052	0.069
NFI	0.88	0.88	0.87	0.86	0.85	0.77	0.88	0.87	0.82
NNFI	0.93	0.93	0.93	0.92	0.91	0.83	0.93	0.93	0.88
CFI	0.94	0.94	0.93	0.93	0.92	0.83	0.94	0.94	0.89
GFI	0.90	0.90	0.89	0.90	0.89	0.86	0.91	0.90	0.88

Model A: Same factor structure with indifferent latent variables and observed items is specified.
 Model B: Factor loading is further constrained from model A.
 Model C: Both factor loading and error variance are constrained between cities.
 a: Statistically significant at 0.01 level

The results of the tests of factor structure suggested that the usefulness of the FRO scale may vary across different cities. Hence, individual tests for model fitness were conducted in individual cities. Table 4.14 indicates the model fitness of the FRO scale in the three different cities. In every case, the RMSEA is less than 0.06, and the chi-square is less than three times the model degree of freedom. Hence, the six correlated factors model of the proposed FRO scale in the three cities showed a satisfactory fit (Hu et al. 1992). The factor loading of each item is listed in Table 4.15.

TABLE 4.14
COMPARISON OF THE MODEL FITNESS FOR FRO SCALE

	FRO Scale		
	Shanghai	Dalian	Lanzhou
Absolute Measures			
χ^2 Statistics	271.27	310.05	304.04
GFI	0.92	0.91	0.91
RMSEA	0.050	0.058	0.056
Incremental Fit Measures			
CFI	0.94	0.91	0.94
Parsimonious Fit Measures			
AGFI	0.89	0.87	0.88
NC(χ^2 /df)	1.75	2.00	1.96

TABLE 4.15
FACTOR LOADING OF FRO SCALE IN FOUR CITIES OF PRC
(STUDY 4)

Item	Factor Loading (λ)			
	Shanghai	Dalian	Lanzhou	Hong Kong
<i>Factor 1: Love Orientation</i>				
Homosexuality is acceptable	0.71	0.56	0.65	0.35
Cohabitation is acceptable	0.52	0.41	0.75	0.54
Female with more than one sex partner is acceptable	0.38	0.66	0.66	0.51
<i>Factor 2: Wifehood Orientation</i>				
Looking after family should be woman's priority	0.66	0.58	0.67	0.68
Wife's priority is to look after family's needs	0.66	0.68	0.68	0.72
For married woman, family is most important	0.54	0.59	0.59	0.69
<i>Factor 3: Motherhood Orientation</i>				
Woman should be proud to be a mother	0.59	0.49	0.50	0.49
Having children is woman's greatest achievement	0.69	0.70	0.70	0.71
Woman's priority is to look after children	0.57	0.74	0.67	0.84
<i>Factor 4: Societal Orientation</i>				
Everyone should participate in charity work	0.63	0.50	0.60	0.54
Willing to pay more tax to improve elder's living	0.45	0.45	0.38	0.52
Woman should be aware of current affairs/politics	0.60	0.45	0.63	0.60
Willing to contribute to future of society	0.40	0.22	0.59	0.53
<i>Factor 5: Career Orientation</i>				
Woman should have their own career	0.76	0.60	0.75	0.63
Woman should not resign from work because of family	0.51	0.47	0.61	0.53
Do not mind reducing family time for work	0.41	0.44	0.50	0.43
<i>Factor 6: Appearance Orientation</i>				
Good outlook helps in career development	0.55	0.69	0.72	0.69
Easy to be acceptable with beautiful appearance	0.78	0.79	0.86	0.74
People will easily agree to you if you have good looks	0.71	0.75	0.78	0.73
Good outlook would contribute to success	0.52	0.49	0.68	0.80

4.5.3 Comparison of reliability and validity across samples

To further validate the FRO scale in the three cities, convergent, discriminated and nomological validity of the FRO scale were assessed using approaches similar to those employed in study 3. The results of the analyses of the three cities were listed together for comparison.

4.5.3.1 SCALE RELIABILITY

The stability of the measures was first examined for the three cities. As shown in Table 4.16, most of the coefficient alphas of the six subscales are above or very close to 0.5, which is considered to be acceptable for an exploratory study (Nunnally 1978).

TABLE 4.16
THE COEFFICIENT ALPHAS OF THE SIX DIMENSIONS OF FRO IN FOUR CITIES

	Shanghai	Dalian	Lanzhou	Hong Kong
Wifehood Orientation	0.648	0.648	0.677	0.738
Motherhood Orientation	0.635	0.675	0.642	0.713
Appearance Orientation	0.727	0.773	0.845	0.832
Love Orientation	0.536	0.540	0.725	0.520
Career Orientation	0.542	0.476	0.645	0.607
Societal Orientation	0.604	0.474	0.636	0.631
No. of sample	301	303	304	312
No. of item	20	20	20	20

4.5.3.2 CONVERGENT VALIDITY

We continued to use two approaches to examine the convergent validity of the FRO scale. The λ coefficient of each item was examined first. As Table 4.15 shows, most of the items in the three cities were significant and above 0.4. One item of love orientation in the Shanghai sample and one item of societal orientation in the Lanzhou sample were 0.38, which is very close to 0.4, and only one item of societal orientation in Dalian showed a low but significant factor loading (0.22). Thus, most of the items with the exception of one in Dalian fall nicely into their respective constructs.

Another procedure suggested by Bagozzi (1993) was also used to examine the construct's convergent validity. The correlation between each factor and the

self-reported statements were scrutinized. As shown in Table 4.17A, 4.17B, and 4.17C, the Shanghai (Table 4.17A) and Lanzhou (Table 4.17C) samples demonstrate a similar pattern to the Hong Kong sample. All the factors are significantly correlated with the self-reported statements except one pair (i.e., the correlation between love and love orientation are negatively correlated insignificantly). In the Dalian (Table 4.17B) sample, the insignificant negative correlation between love and love orientation also occurred. Furthermore, the women questioned in the Dalian sample may also perceive the self-reported statement about “the importance of beauty” differently, and hence there is an insignificant low correlation to appearance orientation.

TABLE 4.17A
CORRELATIONS BETWEEN FRO AND SELF-REPORTED FEMALE ROLE (SHANGHAI)

Shanghai sample Self-reported female role						
Scales	Love is important to me	Family is important to me	Being a Conventional Mother is important to me	Social issues are important to me	Career is important to me	Beauty is important to me
Love Orientation	-0.014	-0.150 ^a	-0.243 ^a	-0.091	0.006	0.046
Wifehood Orientation	0.236 ^a	0.307 ^a	0.330 ^a	0.038	-0.162 ^a	0.125 ^b
Motherhood Orientation	0.274 ^a	0.409 ^a	0.437 ^a	0.108	-0.075	0.075
Societal Orientation	0.105	0.297 ^a	0.215 ^a	0.318 ^a	0.213 ^a	0.174 ^a
Career Orientation	-0.007	0.214 ^a	0.035	0.134 ^b	0.223 ^a	0.166 ^a
Appearance Orientation	0.058	0.230 ^a	0.109	0.096	0.054	0.172 ^a

a: Statistically significant at 0.01 level
b: Statistically significant at 0.05 level

TABLE 4.17B

CORRELATIONS BETWEEN FRO AND SELF-REPORTED FEMALE ROLE (DALIAN)

Dalian sample <i>Self-reported female role</i>						
Scales	Love is important to me	Family is important to me	Being a Conventional Mother is important to me	Social issues are important to me	Career is important to me	Beauty is important to me
Love Orientation	-0.016	-0.040	-0.118 ^b	0.021	0.039	0.074
Wifehood Orientation	0.071	0.141 ^b	0.212 ^a	-0.097	-0.228 ^a	-0.031
Motherhood Orientation	0.162 ^a	0.216 ^a	0.294 ^a	0.047	-0.150 ^a	-0.048
Societal Orientation	0.168 ^a	0.171 ^a	0.196 ^a	0.262 ^a	0.098	0.090
Career Orientation	0.083	0.135 ^b	0.087	0.108	0.162 ^a	0.099
Appearance Orientation	0.008	0.060	0.117 ^b	0.011	0.102	0.048

a: Statistically significant at 0.01 level

b: Statistically significant at 0.05 level

TABLE 4.17C

CORRELATIONS BETWEEN FRO AND SELF-REPORTED FEMALE ROLE (LANZHOU)

Lanzhou sample Self-reported female role						
Scales	Love is important to me	Family is important to me	Being a Conventional Mother is important to me	Social issues are important to me	Career is important to me	Beauty is important to me
Love Orientation	-0.047	-0.299 ^a	-0.261 ^a	0.013	0.053	0.059
Wifehood Orientation	0.043	0.218 ^a	0.298 ^a	0.091	-0.034	-0.020
Motherhood Orientation	0.160 ^a	0.385 ^a	0.411 ^a	0.047	-0.030	0.095
Societal Orientation	0.254 ^a	0.255 ^a	0.065	0.332 ^a	0.308 ^a	0.281 ^a
Career Orientation	0.127 ^b	0.261 ^a	0.057	0.200 ^a	0.286 ^a	0.257 ^a
Appearance Orientation	0.046	0.149 ^a	0.123 ^b	0.279 ^a	0.151 ^b	0.315 ^a

a: Statistically significant at 0.01 level

b: Statistically significant at 0.05 level

4.5.3.3 *DISCRIMINANT VALIDITY*

Using the same criteria mentioned in the discussion of study 3, pairwise correlations between factors obtained from the FRO scale were compared with the variance-extracted estimates for the constructs making up each possible pair. Table 4.18 shows evidence of the discriminant validity of the FRO scale in the three cities.

TABLE 4.18
COMPARISON BETWEEN FACTOR CORRELATION AND VARIANCE EXTRACTED

		Shanghai		Dalian		Lanzhou	
		Square of Correlation	Variance Extracted	Square of Correlation	Variance Extracted	Square of Correlation	Variance Extracted
1.	Love Orientation & Wifehood Orientation	0.002	0.310 & 0.387	0.004	0.300 & 0.380	0.008	0.473 & 0.417
2.	Love Orientation & Motherhood Orientation	0.019	0.310 & 0.383	0.009	0.300 & 0.423	0.038	0.473 & 0.390
3.	Love Orientation & Societal Orientation	0.000	0.310 & 0.280	0.019	0.300 & 0.178	0.008	0.473 & 0.313
4.	Love Orientation & Career Orientation	0.000	0.310 & 0.337	0.003	0.300 & 0.257	0.006	0.473 & 0.397
5.	Love Orientation & Appearance Orientation	0.001	0.310 & 0.418	0.002	0.300 & 0.475	0.002	0.473 & 0.583
6.	Wifehood Orientation & Motherhood Orientation	0.296	0.387 & 0.383	0.187	0.380 & 0.423	0.190	0.417 & 0.390
7.	Wifehood Orientation & Societal Orientation	0.005	0.387 & 0.280	0.006	0.380 & 0.178	0.002	0.417 & 0.313
8.	Wifehood Orientation & Career Orientation	0.000	0.387 & 0.337	0.000	0.380 & 0.257	0.026	0.417 & 0.397
9.	Wifehood Orientation & Appearance Orientation	0.030	0.387 & 0.418	0.036	0.380 & 0.475	0.018	0.417 & 0.583
10	Motherhood Orientation & Societal Orientation	0.102	0.383 & 0.280	0.088	0.423 & 0.178	0.035	0.390 & 0.313
11	Motherhood Orientation & Career Orientation	0.018	0.383 & 0.337	0.044	0.423 & 0.257	0.019	0.390 & 0.397
12	Motherhood Orientation & Appearance Orientation	0.068	0.387 & 0.418	0.052	0.423 & 0.475	0.047	0.390 & 0.583
13	Societal Orientation & Career Orientation	0.222	0.280 & 0.337	0.157	0.178 & 0.257	0.301	0.313 & 0.397
14	Societal Orientation & Appearance Orientation	0.183	0.280 & 0.418	0.057	0.178 & 0.475	0.155	0.313 & 0.583
15	Career Orientation & Appearance Orientation	0.176	0.337 & 0.418	0.111	0.257 & 0.475	0.162	0.397 & 0.583

4.5.3.4 *NOMOLOGICAL VALIDITY*

As discussed in the description of study 3 above, FRO is expected to correlate with some relevant consumption values. The same set of six hypotheses mentioned above for the Hong Kong was tested among the samples from the three additional cities. Table 4.19A demonstrates the response of the Shanghai sample. As hypothesized, H1a, H1b, H2b, H3a, H3b, H4 and H6 were supported. Wifehood orientation significantly correlated with family value; motherhood orientation significantly correlated with price value and family value; societal orientation significantly correlated with environmental protection value; career orientation significantly correlated with efficiency value and quality value; and appearance orientation significantly correlated with social value. However, two hypothesized relationships, namely, H2a and H5 were not supported. Love orientation did not significantly correlate with social value, and wifehood orientation had an insignificant correlation with price value.

TABLE 4.19A
CORRELATIONS BETWEEN CONSUMPTION VALUES AND THE SIX DIMENSIONS OF FRO
(SHANGHAI)

	Social Value	Price Value	Family Value	Efficiency Value	Environment al Protection Value	Quality Value
Hong Kong sample (N = 312)						
Love Orientation	0.027	-0.008	-0.017	-0.084	0.029	0.028
Wifehood Orientation	0.134 ^b	0.047	0.130 ^b	0.106	0.081	0.109
Motherhood Orientation	0.183 ^a	0.193 ^a	0.263 ^a	0.233 ^a	0.199 ^a	0.210 ^a
Societal Orientation	0.226 ^a	0.296 ^a	0.240	0.325 ^a	0.368 ^a	0.432 ^a
Career Orientation	0.196 ^a	0.313 ^a	0.190 ^a	0.304 ^a	0.287 ^a	0.376 ^a
Appearance Orientation	0.338 ^a	0.337 ^a	0.306 ^a	0.317 ^a	0.311 ^a	0.374 ^a

a: Statistically significant at 0.01 level

b: Statistically significant at 0.05 level

Table 4.19B demonstrates the results for the Dalian sample. As hypothesized, H2b, H3a, H3b, H4 and H6 were supported. Wifehood orientation significantly correlated with family value; societal orientation significantly correlated with environmental protection value; career orientation significantly correlated with efficiency value and quality value; and appearance orientation significantly correlated with social value. However, four hypothesized relationships, namely, H1a, H1b, H2a and H5 were not supported. Love orientation did not significantly correlate with social value; wifehood orientation did not significantly correlate with price value; and motherhood orientation did not significantly correlate with either price or family value.

TABLE 4.19B
CORRELATIONS BETWEEN CONSUMPTION VALUES AND THE SIX DIMENSIONS OF FRO
(DALIAN)

	Social Value	Price Value	Family Value	Efficiency Value	Environmental Protection Value	Quality Value
Hong Kong sample (N = 312)						
Love Orientation	-0.054	-0.089	-0.052	-0.075	-0.026	-0.045
Wifehood Orientation	0.187 ^a	0.101	0.127 ^b	0.020	0.027	0.029
Motherhood Orientation	0.040	0.076	0.034	0.113 ^b	0.131 ^b	0.097
Societal Orientation	0.171 ^a	0.263 ^a	0.110	0.250 ^a	0.295 ^a	0.327 ^a
Career Orientation	0.076	0.177 ^a	0.044	0.179 ^a	0.133 ^b	0.275 ^a
Appearance Orientation	0.251 ^a	0.132 ^b	0.172 ^a	0.155 ^a	0.133 ^b	0.112

a: Statistically significant at 0.01 level

b: Statistically significant at 0.05 level

Table 4.19C demonstrates the results from the Lanzhou sample. All hypotheses except H5 were supported. As hypothesized, wifeness and motherhood orientation significantly correlated with price value and family value; societal orientation significantly correlated with environmental protection value; career orientation significantly correlated with efficiency value and quality value; and appearance orientation significantly correlated with social value. The only unsupported hypothesized relationship was the insignificant correlation between love orientation and social value.

The three kinds of validity tests demonstrate that the performance of the proposed FRO scale is satisfactory, especially in the Shanghai and Lanzhou samples. Although there is room for improvement, this scale can serve as an instrument to classify Chinese women in PRC.

TABLE 4.19C
CORRELATIONS BETWEEN CONSUMPTION VALUES AND THE SIX DIMENSIONS OF FRO
(LANZHOU)

	Social Value	Price Value	Family Value	Efficiency Value	Environmental Protection Value	Quality Value
Hong Kong sample (N = 312)						
Love Orientation	0.046	0.073	-0.002	0.000	0.008	0.093
Wifehood Orientation	0.079	0.166 ^a	0.147 ^b	0.074	0.085	0.145 ^b
Motherhood Orientation	0.268	0.356 ^a	0.231 ^a	0.175 ^a	0.275 ^a	0.336 ^a
Societal Orientation	0.418 ^a	0.290 ^a	0.352 ^a	0.376 ^a	0.445 ^a	0.427 ^a
Career Orientation	0.277 ^a	0.250 ^a	0.231 ^a	0.357 ^a	0.387 ^a	0.393 ^a
Appearance Orientation	0.388 ^a	0.284 ^a	0.214 ^a	0.272 ^a	0.287 ^a	0.311 ^a

a: Statistically significant at 0.01 level

b: Statistically significant at 0.05 level

4.6 Additional Analysis

4.6.1 *Comparing Arnott's feminism scale with FRO in four cities of PRC*

Earlier literature indicates that Arnott's feminism scale (1972) is a widely used instrument in studying FRO. As we have mentioned previously that some essential attributes of Chinese women may be neglected when Arnott's feminism scale is used to analyze Chinese women, we decided to study the efficacy of Arnott's feminism scale.

First, we examined the convergent and discriminant validity of Arnott's feminism scale with the proposed FRO scale. The correlation between the 10 item unidimensional construct of Arnott's feminism scale and the six-dimensional FRO scale was examined in the four cities (Table 4.20). The analysis showed that Arnott's feminism scale displays a high and significant correlation with the wifehood and motherhood orientation dimensions, i.e. all the correlations are above or very close to 0.4. This result is in line with the original objective of Arnott's scale, which aimed to measure housewives' attitudes. On the other hand, the low correlation level with the other FRO dimensions demonstrates that some important aspects of current female roles captured by the proposed FRO scale may not be included in Arnott's feminism scale.

TABLE 4.20
CORRELATIONS BETWEEN ARNOTT'S FEMINISM SCALE AND THE FRO
SCALE IN FOUR CITIES OF PRC

	Hong Kong (N=312)	Shanghai (N=301)	Dalian (N=303)	Lanzhou (N=304)
Love Orientation	-0.121 ^b	0.009	0.00	-0.009
Wifehood Orientation	0.590^a	0.487^a	0.461^a	0.390^a
Motherhood Orientation	0.500^a	0.443^a	0.408^a	0.529^a
Society Orientation	-0.040	0.287 ^a	0.236 ^a	0.349 ^a
Career Orientation	-0.119 ^b	0.327 ^a	0.224 ^a	0.258 ^a
Appearance Orientation	0.127 ^b	0.431 ^a	0.406 ^a	0.369 ^a

a: Statistically significant at 0.01 level b: Statistically significant at 0.05 level

A further comparison of the predictability between the two scales was conducted. To assess the predictive ability of the proposed FRO scale and Arnott's feminism scale, the six dimensions of the FRO scale and the single dimension of Arnott's feminism scale were assigned to be independent variables, while the dependent variables were the six consumption values. Two sets of regression analysis were conducted. The first set of regression analysis examine how many variance can be explained if we use FRO scale to predict each consumption value in the four cities of PRC. The second set of regression analysis examine how many variance can be

explained when we use Arnott's feminism scale to predict each consumption value in the four cities of PRC. The result, as shown in Table 4.21, indicated that the adjusted R^2 of Arnott's feminism scale is far lower than that of the FRO scale. In other words, the consumption values could be better predicted by the FRO scale.

TABLE 4.21A
 PREDICTIVE ABILITY OF FRO SCALE AND ARNOTT'S FEMINISM SCALE: REGRESSION ANALYSIS
 (HONG KONG SAMPLE)

(LONG RONG SAMPLE)					
Dependent Variable	FRO Scale (FROS)		Arnott's Feminism Scale (AFS)		Predictive Ability
	Independent Variable	Adjusted R ²	Adjusted R ²		
Social Value	Appearance Orientation ^a	0.150 ^a	0.098 ^a	FROS > AFS	FROS > AFS
	Motherhood Orientation ^a				
	Love Orientation ^a				
Price Value	Appearance Orientation ^a	0.101 ^a	0.004	FROS > AFS	FROS > AFS
	Motherhood Orientation ^a				
	Career Orientation ^b				
Family Value	Appearance Orientation ^a	0.049 ^a	0.016 ^b	FROS > AFS	FROS > AFS
	Societal Orientation ^a				
Efficiency Value	Appearance Orientation ^a	0.124 ^a	-0.003	FROS > AFS	FROS > AFS
	Societal Orientation ^a				
Environment Protection Value	Societal Orientation ^a	0.069 ^a	0.003	FROS > AFS	FROS > AFS
	Career Orientation ^a				
Quality Value	Appearance Orientation ^a	0.101 ^a	0.003	FROS > AFS	FROS > AFS
	Career Orientation ^a				

a: Statistically significant at 0.01 level b: Statistically significant at 0.05 level

TABLE 4.21B
PREDICTIVE ABILITY OF FRO SCALE AND ARNOTT'S FEMINISM SCALE: REGRESSION ANALYSIS
(SHANGHAI SAMPLE)

Dependent Variable	FRO Scale (FROS)		Arnott's Feminism Scale (AFS)		Predictive Ability
	Independent Variable	Adjusted R ²	Adjusted R ²		
Social Value	Appearance Orientation ^a	0.111 ^a	0.075 ^a		FROS > AFS
Price Value	Appearance Orientation ^a Career Orientation ^b Societal Orientation ^b	0.152 ^a	0.077 ^a		FROS > AFS
Family Value	Appearance Orientation ^a Motherhood Orientation ^a	0.124 ^a	0.061 ^a		FROS > AFS
Efficiency Value	Societal Orientation ^b Appearance Orientation ^a Career Orientation ^b Motherhood Orientation ^b	0.162 ^a	0.053 ^a		FROS > AFS
Environment Protection Value	Societal Orientation ^a Appearance Orientation ^a	0.159 ^a	0.051 ^a		FROS > AFS
Quality Value	Societal Orientation ^a Appearance Orientation ^a Career Orientation ^a	0.244 ^a	0.113 ^a		FROS > AFS

a: Statistically significant at 0.01 level b: Statistically significant at 0.05 level

TABLE 4.21C
PREDICTIVE ABILITY OF FRO SCALE AND ARNOTT'S FEMINISM SCALE: REGRESSION ANALYSIS
(DALIAN SAMPLE)

Dependent Variable	FRO Scale (FROS)	Arnott's Feminism Scale (AFS)		Predictive Ability
		Independent Variable	Adjusted R ²	
Social Value		Appearance Orientation ^a	0.096 ^a	FROS > AFS
		Wifehood Orientation ^a		
		Societal Orientation ^b		
		Motherhood Orientation ^b		
Price Value		Societal Orientation ^a	0.066 ^a	FROS > AFS
Family Value		Appearance Orientation ^a	0.026 ^a	FROS > AFS
Efficiency Value		Societal Orientation ^a	0.060 ^a	FROS > AFS
Environment Protection Value		Societal Orientation ^a	0.084 ^a	FROS > AFS
Quality Value		Societal Orientation ^a Career Orientation ^a	0.126 ^a	FROS > AFS

a: Statistically significant at 0.01 level b: Statistically significant at 0.05 level

TABLE 4.21D
 PREDICTIVE ABILITY OF FRO SCALE AND ARNOTT'S FEMINISM SCALE: REGRESSION ANALYSIS
 (LANZHOU SAMPLE)

Dependent Variable	FRO Scale (FROS) Independent Variable	Arnott's Feminism Scale (AFS)	
		Adjusted R ²	Predictive Ability
Social Value	Appearance Orientation ^a	0.262 ^a	0.125 ^a
	Societal Orientation ^a		
	Love Orientation ^b		
Price Value	Motherhood Orientation ^a		
	Motherhood Orientation ^a	0.212 ^a	0.175 ^a
	Societal Orientation ^a		
Family Value	Love Orientation ^a		
	Appearance Orientation ^a		
	Societal Orientation ^a	0.146 ^a	0.079 ^a
Efficiency Value	Motherhood Orientation ^a		
	Societal Orientation ^a	0.181 ^a	0.128 ^a
	Career Orientation ^a		
Environment Protection Value	Wifehood Orientation ^b		
	Societal Orientation ^a	0.255 ^a	0.121 ^a
	Motherhood Orientation ^a		
Quality Value	Career Orientation ^a		
	Societal Orientation ^a	0.314 ^a	0.202 ^a
	Motherhood Orientation ^a		
	Love Orientation ^a		
	Career Orientation ^a		
	Wifehood Orientation ^a		

a: Statistically significant at 0.01 level b: Statistically significant at 0.05 level

To further examine the relative importance of the FRO scale and Arnott's feminism scale in predicting consumption values, hierarchical regression analysis was conducted with this approach. We ran two sets of multiple regression analysis. In the first set of multiple regression analysis, three models were compared. Model 1 analyses how many variance can be explained by FRO scale; Model 2 analyses how many variance can be explained by both FRO scale and Arnott's feminism scale; Model 3 analyses how many variance can be explained by FRO scale, Arnott's feminism scale and participant's demographic characteristics. By comparing these three models, the result will indicate how many variance which explained by FRO scale will be partial out by Arnott's feminism scale and participant's demographic characteristics. The second set of multiple regression analysis aim at cross validates the findings of the first set of multiple regression analysis. Therefore, another three models were compared. Model A analyses how many variance can be explained by Arnott's feminism scale; Model B analyses how many variance can be explained by both Arnott's feminism scale and FRO scale; and Model C analyses how many variance can be explained by Arnott's feminism scale, FRO scale and participant's demographic characteristics. The two sets of multiple regression analysis were conducted with Hong Kong (Table 4.22A), Shanghai (Table 4.22B), Dalian (Table 4.22C) , and Lanzhou samples (Table 4.22D). As shown in the four tables, a

consistent pattern was found. When FRO was the first independent variable entered into the model, Arnott's feminism scale and participants' demographic characteristics appeared to be insignificant variables to explain additional variance in consumption values. However, in analysis 2, although Arnott's feminism scale was entered before the FRO scale in the model, the FRO scale can significantly explain additional variances in consumption values. Therefore, we can conclude that the variance explained by FRO scale cannot be partial out by Arnott's feminism scale and participant's demographic characteristics.. In other words, using FRO scale can make a better prediction on woman's consumption values. Therefore it leads to the conclusion that the proposed FRO scale should be a better instrument than Arnott's feminism scale for describing and analyzing the Chinese female consumer.

TABLE 4.22A
COMPARING PREDICTIVE ABILITY OF FROS AND AFS BY MULTIPLE REGRESSION ANALYSIS
(HONG KONG SAMPLE)

Dependent Variable	Multiple Regression Analysis (1)			Multiple Regression Analysis (2)			Additional Variance can be Explained by FROS
	Independent Variable	Adjusted R ²	R ² Change	Independent Variable	Adjusted R ²	R ² Change	
Social Value	Model 1: FROS	0.129	0.146 ^a	Model A: AFS	0.064	0.067 ^a	YES
	Model 2: FROS +AFS	0.146	0.019 ^a	Model B: AFS + FROS	0.146	0.099 ^a	
	Model 3: FROS +AFS+PDC	0.143	0.022	Model C: AFS + FROS +PDC	0.143	0.022	
Price Value	Model 1: FROS	0.091	0.109 ^a	Model A: AFS	0.004	0.007	YES
	Model 2: FROS +AFS	0.089	0.001	Model B: AFS + FROS	0.089	0.102 ^a	
	Model 3: FROS +AFS+PDC	0.088	0.025	Model C: AFS + FROS +PDC	0.088	0.025	
Family Value	Model 1: FROS	0.043	0.062 ^a	Model A: AFS	0.016	0.019 ^b	YES
	Model 2: FROS +AFS	0.045	0.004	Model B: AFS + FROS	0.045	0.047 ^b	
	Model 3: FROS +AFS+PDC	0.068	0.050	Model C: AFS + FROS +PDC	0.068	0.050	
Efficiency Value	Model 1: FROS	0.121	0.138 ^a	Model A: AFS	0.003	0.000	YES
	Model 2: FROS +AFS	0.118	0.000	Model B: AFS + FROS	0.118	0.138 ^a	
	Model 3: FROS +AFS+PDC	0.111	0.018	Model C: AFS + FROS +PDC	0.111	0.018	
Environment Protection Value	Model 1: FROS	0.071	0.089 ^a	Model A: AFS	0.003	0.006	YES
	Model 2: FROS +AFS	0.075	0.007	Model B: AFS + FROS	0.075	0.090 ^a	
	Model 3: FROS +AFS+PDC	0.068	0.020	Model C: AFS + FROS +PDC	0.068	0.020	
Quality Value	Model 1: FROS	0.114	0.131 ^a	Model A: AFS	0.003	0.006	YES
	Model 2: FROS +AFS	0.113	0.003	Model B: AFS + FROS	0.113	0.127 ^a	
	Model 3: FROS +AFS+PDC	0.117	0.029	Model C: AFS + FROS +PDC	0.117	0.029	

FROS: Female Role Orientation Scale, AFS: Arnott's Feminism Scale, PDC: Participant's Demographic Characteristics;
a: Statistically significant at 0.01 level b: Statistically significant at 0.05 level

TABLE 4.22B
COMPARING PREDICTIVE ABILITY OF FROS AND AFS BY MULTIPLE REGRESSION ANALYSIS
(SHANGHAI SAMPLE)

Dependent Variable	Multiple Regression Analysis (1)			Multiple Regression Analysis (2)			Additional Variance can be Explained by FROS
	Independent Variable	Adjusted R ²	R ² Change	Independent Variable	Adjusted R ²	R ² Change	
Social Value	Model 1: FROS	0.111	0.129 ^a	Model A: AFS	0.074	0.077 ^a	YES
	Model 2: FROS +AFS	0.120	0.012 ^b	Model B: AFS + FROS	0.120	0.064 ^a	
	Model 3: FROS +AFS+PDC	0.109	0.010	Model C: AFS + FROS +PDC	0.109	0.010	
Price Value	Model 1: FROS	0.153	0.170 ^a	Model A: AFS	0.077	0.080 ^a	YES
	Model 2: FROS +AFS	0.164	0.013 ^b	Model B: AFS + FROS	0.164	0.104 ^a	
	Model 3: FROS +AFS+PDC	0.200	0.054	Model C: AFS + FROS +PDC	0.200	0.054 ^a	
Family Value	Model 1: FROS	0.120	0.137 ^a	Model A: AFS	0.061	0.064 ^a	YES
	Model 2: FROS +AFS	0.121	0.004	Model B: AFS + FROS	0.121	0.078 ^a	
	Model 3: FROS +AFS+PDC	0.112	0.011	Model C: AFS + FROS +PDC	0.112	0.011	
Efficiency Value	Model 1: FROS	0.160	0.177 ^a	Model A: AFS	0.053	0.056 ^a	YES
	Model 2: FROS +AFS	0.158	0.001	Model B: AFS + FROS	0.158	0.122 ^a	
	Model 3: FROS +AFS+PDC	0.156	0.018	Model C: AFS + FROS +PDC	0.156	0.018	
Environment Protection Value	Model 1: FROS	0.162	0.178 ^a	Model A: AFS	0.051	0.054 ^a	YES
	Model 2: FROS +AFS	0.161	0.002	Model B: AFS + FROS	0.161	0.126 ^a	
	Model 3: FROS +AFS+PDC	0.154	0.013	Model C: AFS + FROS +PDC	0.154	0.013	
Quality Value	Model 1: FROS	0.242	0.257 ^a	Model A: AFS	0.113	0.116 ^a	YES
	Model 2: FROS +AFS	0.256	0.016 ^b	Model B: AFS + FROS	0.256	0.157 ^a	
	Model 3: FROS +AFS+PDC	0.278	0.038 ^b	Model C: AFS + FROS +PDC	0.278	0.038 ^b	

FROS: Female Role Orientation Scale, AFS: Arnott’s Feminism Scale, PDC: Participant’s Demographic Characteristics;
a: Statistically significant at 0.01 level b: Statistically significant at 0.05 level

TABLE 4.22C
COMPARING PREDICTIVE ABILITY OF FROS AND AFS BY MULTIPLE REGRESSION ANALYSIS
(DALIAN SAMPLE)

Dependent Variable	Multiple Regression Analysis (1)			Multiple Regression Analysis (2)			Additional Variance can be Explained by FROS
	Independent Variable	Adjusted R ²	R ² Change	Independent Variable	Adjusted R ²	R ² Change	
Social Value	Model 1: FROS	0.090	0.108 ^a	Model A: AFS	0.026	0.029 ^a	YES
	Model 2: FROS +AFS	0.089	0.002	Model B: AFS + FROS	0.089	0.081 ^a	
	Model 3: FROS +AFS+PDC	0.083	0.015	Model C: AFS + FROS +PDC	0.083	0.015	
Price Value	Model 1: FROS	0.071	0.090 ^a	Model A: AFS	0.013	0.017 ^b	YES
	Model 2: FROS +AFS	0.069	0.001	Model B: AFS + FROS	0.069	0.074 ^a	
	Model 3: FROS +AFS+PDC	0.064	0.017	Model C: AFS + FROS +PDC	0.064	0.017	
Family Value	Model 1: FROS	0.032	0.051 ^b	Model A: AFS	0.023	0.026 ^a	YES
	Model 2: FROS +AFS	0.034	0.006	Model B: AFS + FROS	0.034	0.030	
	Model 3: FROS +AFS+PDC	0.034	0.022	Model C: AFS + FROS +PDC	0.034	0.022	
Efficiency Value	Model 1: FROS	0.061	0.079 ^a	Model A: AFS	0.025	0.028 ^a	YES
	Model 2: FROS +AFS	0.066	0.008	Model B: AFS + FROS	0.066	0.059 ^a	
	Model 3: FROS +AFS+PDC	0.052	0.008	Model C: AFS + FROS +PDC	0.052	0.008	
Environment Protection Value	Model 1: FROS	0.075	0.093 ^a	Model A: AFS	0.015	0.018 ^b	YES
	Model 2: FROS +AFS	0.074	0.002	Model B: AFS + FROS	0.074	0.077 ^a	
	Model 3: FROS +AFS+PDC	0.067	0.015	Model C: AFS + FROS +PDC	0.067	0.015	
Quality Value	Model 1: FROS	0.115	0.133 ^a	Model A: AFS	0.005	0.009	YES
	Model 2: FROS +AFS	0.002	0.000	Model B: AFS + FROS	0.112	0.124 ^a	
	Model 3: FROS +AFS+PDC	0.118	0.026	Model C: AFS + FROS +PDC	0.008	0.026	

FROS: Female Role Orientation Scale, AFS: Arnott's Feminism Scale, PDC: Participant's Demographic Characteristics;
a: Statistically significant at 0.01 level b: Statistically significant at 0.05 level

TABLE 4.22D
COMPARING PREDICTIVE ABILITY OF FROS AND AFS BY MULTIPLE REGRESSION ANALYSIS
(LANZHOU SAMPLE)

Dependent Variable	Multiple Regression Analysis (1)			Multiple Regression Analysis (2)			Additional Variance can be Explained by FROS
	Independent Variable	Adjusted R ²	R ² Change	Independent Variable	Adjusted R ²	R ² Change	
Social Value	Model 1: FROS	0.236	0.251 ^a	Model A: AFS	0.121	0.124 ^a	YES
	Model 2: FROS +AFS	0.243	0.009	Model B: AFS + FROS	0.243	0.137 ^a	
	Model 3: FROS +AFS+PDC	0.256	0.030	Model C: AFS + FROS +PDC	0.256	0.030	
Price Value	Model 1: FROS	0.214	0.229 ^a	Model A: AFS	0.175	0.178 ^a	YES
	Model 2: FROS +AFS	0.238	0.026 ^a	Model B: AFS + FROS	0.238	0.078 ^a	
	Model 3: FROS +AFS+PDC	0.239	0.019	Model C: AFS + FROS +PDC	0.239	0.019	
Family Value	Model 1: FROS	0.153	0.170 ^a	Model A: AFS	0.079	0.083 ^a	YES
	Model 2: FROS +AFS	0.154	0.004	Model B: AFS + FROS	0.154	0.091 ^a	
	Model 3: FROS +AFS+PDC	0.145	0.011	Model C: AFS + FROS +PDC	0.145	0.011	
Efficiency Value	Model 1: FROS	0.183	0.199 ^a	Model A: AFS	0.128	0.131 ^a	YES
	Model 2: FROS +AFS	0.213	0.032 ^a	Model B: AFS + FROS	0.213	0.100 ^a	
	Model 3: FROS +AFS+PDC	0.219	0.024	Model C: AFS + FROS +PDC	0.219	0.024	
Environment Protection Value	Model 1: FROS	0.261	0.275 ^a	Model A: AFS	0.121	0.124 ^a	YES
	Model 2: FROS +AFS	0.266	0.008	Model B: AFS + FROS	0.266	0.159 ^a	
	Model 3: FROS +AFS+PDC	0.311	0.059 ^a	Model C: AFS + FROS +PDC	0.311	0.059 ^a	
Quality Value	Model 1: FROS	0.315	0.329 ^a	Model A: AFS	0.202	0.205 ^a	YES
	Model 2: FROS +AFS	0.339	0.025 ^a	Model B: AFS + FROS	0.339	0.149 ^a	
	Model 3: FROS +AFS+PDC	0.363	0.039 ^b	Model C: AFS + FROS +PDC	0.363	0.039 ^a	

FROS: Female Role Orientation Scale, AFS: Arnott’s Feminism Scale, PDC: Participant’s Demographic Characteristics;
a: Statistically significant at 0.01 level b: Statistically significant at 0.05 level

CHAPTER FIVE

RESULTS AND DISCUSSION

5.1 Discussion of Findings

The objective of this study is to empirically develop a valid and reliable multidimensional scale for measuring the female role orientation of Chinese women. First, we provided a clear conceptualization of FRO. Then, we followed Churchill's (1979) scale development procedure to develop a reliable and valid FRO scale. The psychometric properties of the proposed multidimensional scale have been rigorously tested. The tests of dimensionality, scale reliability, convergent validity, discriminant validity, nomological validity, and scale generalizability produced satisfactory results.

We have demonstrated the utility of the FRO scale developed in this paper by analyzing its correlations to women's consumption values. Our tests showed that women who value the six dimensions of FRO differently also have different preferences in terms of various consumption values. Women in Hong Kong who place a high value on motherhood and wifehood orientation of FRO are more concerned with product price, and they care about whether products can help them bring the members of their families closer together. Those women who place a high value on career orientation are more interested in high-quality products and in products that

promise to enhance their efficiency. Women who regard their appearance as important prefer those products that improve their social value. Women who place a high value on love orientation seem also to prefer products or services that can consolidate their social status. Those women who are more concerned about societal and environmental issues tend to buy products that are less harmful to the environment. Thus, our data analysis indicates that the FRO scale developed in this paper will be an effective instrument for researchers who wish to further study the distinctive consumption behavior of women.

Moreover, it has been shown that the FRO scale that was developed using a sample of women from Hong Kong can also be used with accuracy to reflect the FRO of Chinese women from three other cities of PRC, namely, Shanghai, Dalian, and Lanzhou. We have examined the factor structure, scale reliability, and validities of FRO scale with samples of women taken in the three cities and demonstrated the generalizability of the FRO scale to these three cities. Our results suggest that although there is room for further improvement in the convergent validity of the construct in each city, the FRO scale can be accurately applied to Chinese women in the four sample cities.

Furthermore, our data demonstrate that the new FRO scale may be a better instrument to use than Arnott's feminism scale when we want to classify the FRO of

Chinese female consumers as opposed to western consumers. We compared the FRO scale with Arnott's feminism scale in studies 3 and 4 by conducting replicated tests of Arnott's ten-item, unidimensional feminism scale simultaneously. Our analysis showed that Arnott's feminism scale might produce an inaccurate result with Chinese female respondents. Our correlation analysis suggests that Arnott's feminism scale fails to fully reflect some new roles that Chinese women in all four of the test cities have adopted, such as love orientation, societal orientation, career orientation, and appearance orientation. In addition, Arnott's feminism scale seems unable to predict Chinese women's attitudes toward consumption values, which the FRO scale developed in this paper does. The tests of predictability for both the FRO scale and Arnott's feminism scale indicate that the adjusted R^2 of Arnott's feminism scale is far lower than that of the FRO scale. Hence, the FRO scale has been shown to be a better instrument than Arnott's feminism scale for predicting the consumption values of the Chinese female consumer.

5.2 Contributions

The major academic contribution of this paper is to offer a conceptual framework for understanding the Chinese female consumer that is a significant improvement on the tools available in the current literature. We provided a clear

conceptualization of an FRO construct by exploring females' attitudes about how to perform their roles. A conceptual model with six dimensions, namely, wifehood orientation, motherhood orientation, career orientation, societal orientation, appearance orientation, and love orientation, was developed. The value of this new conceptualization of FRO lies in its ability to integrate various new and old notions of appropriate female behavior in order to provide a more comprehensive and holistic picture of FRO.

The FRO scale proposed in this paper enriches the conceptualization of female role presented in previous marketing studies. In combination with dimensional constructs such as "working" versus "non-working" women (Jackson, McDaniel, and Rao 1985; Strober and Weinberg 1977, 1980), women with a "high" versus a "low" degree of autonomy (Venkatesh 1980), and the four dimensional constructs suggested by Sin et al. (2001), the FRO scale developed in this study enriches the content and meaning of the construct of measurable FRO and helps to enhance our understanding of the changing and emerging roles of women in general and of Chinese women in particular. The additional perspectives accounted for in the new FRO scale promise to offer new theoretical insights to marketing researchers.

In addition, the fact that the FRO scale was empirically tested and found to be significantly correlated with women's consumption values suggests a direction for

further study of the female consumer. Subsequent studies might undertake a causal analysis of the relationship between FRO and women's consumption values and behaviors.

Besides, as Burnett, Amason, and Hung (1981) have indicated that female consumers' different attitudes toward feminism result in different criteria for evaluating service personnel, we believe that the multidimensional FRO construct can be used to provide further insights into how Chinese women evaluate their service providers and in what way the different dimensions of FRO influence these evaluations.

Furthermore, this study has important implications for future research in emerging or transitional economies. As PRC has just shifted from a Communist system to a more market-oriented system, the conclusions drawn from the Chinese samples taken for this study might both help researchers to understand the evolution of the market system better and provide insight into the emergence of new consumer groups in other countries, such as the post-Soviet republics and the nations of Eastern Europe, that are currently or were once Communist.

Moreover, the generalizability of the FRO scale developed in this study suggests that it can accommodate regional cultural differences. In other words, the FRO scale may be able to accurately measure the FRO of women who have different

cultural backgrounds. Although we could continue to improve the scale by fine-tuning a few of the individual items, we suggest that comparative research on, for example, women in China versus women in Russia and Eastern Europe versus women in the United States may further enhance our understanding of the relationship between female role orientation and consumer behavior.

From a managerial perspective, this study suggests that marketing practitioners may be able to better understand Chinese female consumers according to FRO. Below, we outline five of this study's significant implications for marketers in terms of identifying market segment and formulating promotional and managerial strategies.

First, the FRO scale can be an effective instrument that can help marketers make in-depth classifications of female consumers. Although further empirical study should be done to support this proposition, we believe that marketers will be able to use the FRO scale to formulate a comprehensive segmentation strategy to reach specific groups of Chinese female consumers. By allowing marketers to isolate potential customers according to type and degree of FRO, the scale will improve their ability to attract their target consumers.

Second, the six dimensions of FRO may also help marketing practitioners accurately understand Chinese women's differing female role orientations today.

Women today are something more than sexual playthings or dowdy homemakers. The stereotypes of Chinese women as poorly educated and submissive that are perpetuated by western films, paintings, and literature are misleading. As the six dimensions of the FRO construct developed in this paper indicate, a cohort of successful, well-educated working and career women has emerged in China. Hence, by referring to the six dimensions of FRO, marketers may be able to understand more about current Chinese women in PRC and, as a result, to choose more suitable spokespersons or create more effective advertisements for their products and services by projecting a more accurate image of the female role.

Third, our analysis shows that Chinese women with different FRO may prefer products that embody different values. In other words, they may evaluate products in a variety of ways, giving weight and priority to different aspects. Therefore, marketers may need both to develop products and services with this fact in mind and to tailor their advertising messages in order to satisfy the specific needs of different female consumers.

Fourth, this study provides insights that may be useful for the recruitment and training of retail staff for service providers that hope to target specific groups of Chinese female consumers. Since previous research (Sweeney et al. 1999) has found that retail service quality plays a significant role in the creation of value perceptions,

front line service personnel may be better able to build aggregate value once they understand the decision-making processes of different female consumers. The ability of retail staff to build value may in turn help them generate more business from their target customers.

Finally, the study suggests that the different characteristics of Chinese women in particular regions of PRC should be explored and understood before marketing strategies are adopted in a particular region. Our analysis indicates that the Chinese women in the four cities of PRC that were tested may possess different attitudes about how to perform their different roles. Marketers should therefore proceed with caution when they formulate their marketing strategies for Chinese female consumers in PRC.

5.3 Limitations and Directions for Future Research

This study represents an attempt to build and test a conceptual framework of FRO. The present findings are therefore indicative rather than conclusive, and we would point to four limitations and directions for future research.

One limitation of this study is its cross-sectional nature; it does not track changes in female role orientation over time. We believe that the development of a time-series database and the testing of the FRO scale in a longitudinal framework

would provide additional insights into how or whether women change their attitudes about how to perform their different roles at different ages.

Second, though this scale has incorporated western feminism and beliefs, its focus is on exploring the attitudes of Chinese women. There is room to validate the scale, testing its cross-cultural generalizability in other cultural settings by, for example, comparing Chinese women to women living in the United States or Europe or comparing women in China to women in Asia more generally. We believe that cross-cultural studies of this type would enable researchers to better identify both the etic and the emic dimensions of the FRO scale.

Third, our study has merely proved that Arnott's feminism scale is not adequate for classifying between Chinese women in PRC. Further studies could be done to explore whether the FRO scale is better than Arnott's feminism scale when used in other cultures.

Finally, our study has only demonstrated significant correlations between the six dimensions of FRO and a set of consumption values. As consumer choice is regarded to be a function of the combination of multiple consumption values (Sheth, Newman, and Gross 1991a, 1991b), it would certainly be valuable for researchers to conduct further studies of the causal relationship between FRO and the consumption behavior of Chinese female consumers.

Appendix I

Questionnaire



Project Female

問卷編號： _____

被訪者姓名： _____

電話： _____

訪問日期及時間： _____

傳呼機 / 手提電話： _____

訪問員姓名及編號： _____

你好! 我姓 _____，係 ACORN 市場研究公司的訪問員。我們正在做一項有關生活習慣的研究。想阻你少少時間做個簡單的訪問。謝謝!

問題	答案	編碼	跳問
D10. 請問你自己或你相熟的親戚朋友有冇從事以下的行業呢? [示咭]	市場研究	1	結束
	廣告 / 傳播媒介	2	
	以上皆無	3	繼續
D3. 性別: [記錄]	男	0	結束
	女	1	繼續
D1. 請問你今年幾歲呢? [示咭]	18 歲以下	0	結束
	18 – 20 歲	1	繼續
	21 – 30 歲	2	
	31 – 40 歲	3	
	41 – 50 歲	4	
	51 – 60 歲	5	
	60 歲以上	6	結束
D7. 請問你的家庭每月平均收入大概是多外少呢? [示咭]	HK\$5,000 或以下	1	檢查配額
	HK\$5,001 – HK\$10,000	2	
	HK\$10,001 – HK\$15,000	3	
	HK\$15,001 – HK\$20,000	4	檢查配額
	HK\$20,001 – HK\$30,000	5	
	HK\$30,001 – HK\$40,000	6	
	HK\$40,001 – HK\$50,000	7	
	HK\$50,001 – HK\$60,000	8	
	HK\$60,001 – HK\$70,000	9	
	HK\$70,001 – HK\$80,000	10	
	HK\$80,000 以上	11	
D11. 請問你住在...?	香港 (上海)	1	檢查配額
	九龍 (大連)	2	
	新界 (蘭州)	3	

編號: _____

地點: _____

日期 & 時間: _____

(S) 我會讀出一些句子是描寫婦女在社會和家庭的地位，你可以選擇 1-6 分。1 分代表“非常不同意”，而 6 分代表“非常同意”，你可以選擇 1-6 任何一個分數

輪流發問及出示咭片	非常 唔同意	1	2	3	4	5	6 非常 同意
() 1. 女孩應被訓練成主婦，男孩則應訓練他們從事可發揮他們天份的工作	1	2	3	4	5	6	
() 2. 你願意為社會的未來作出貢獻	1	2	3	4	5	6	
() 3. 同性戀關係是可以接受的	1	2	3	4	5	6	
() 4. 照顧家庭應為女性的首要任務	1	2	3	4	5	6	
() 5. 如果兩人相愛，同居是可以接受的	1	2	3	4	5	6	
() 6. 女性多過一個性伴侶是可以接受的	1	2	3	4	5	6	
() 7. 妻子的首要責任是照顧家庭的需要	1	2	3	4	5	6	
() 8. 對已婚女性來說，最重要的是家庭而不是事業	1	2	3	4	5	6	
() 9. 在婚姻生活中女性應服從丈夫	1	2	3	4	5	6	
() 10. 女性應該以自己作為母親而感到驕傲	1	2	3	4	5	6	
() 11. 女性在婚前不應有性行為	1	2	3	4	5	6	
() 12. 生兒育女是女性一生最大的成就	1	2	3	4	5	6	
() 13. 妻子應避免超越丈夫的成就	1	2	3	4	5	6	
() 14. 每個人都應參加義務工作來服務社會和國家	1	2	3	4	5	6	
() 15. 與男性比較，女性應將家庭放在事業之上	1	2	3	4	5	6	
() 16. 女性在生命中最重要任務是照顧她的孩子	1	2	3	4	5	6	
() 17. 女性應有自己的事業	1	2	3	4	5	6	
() 18. 女性不應為家庭辭去工作	1	2	3	4	5	6	
() 19. 良好的外表能幫助事業發展	1	2	3	4	5	6	
() 20. 女性的事業應比其他事情更重要	1	2	3	4	5	6	
() 21. 女性應該時常留心時事及政府政策的新聞	1	2	3	4	5	6	
() 22. 外表美麗較容易獲得別人接受	1	2	3	4	5	6	
() 23. 女性的成就來自能否培育出優秀的孩子	1	2	3	4	5	6	
() 24. 美麗的面孔較易得到別人對你的認同	1	2	3	4	5	6	
() 25. 妻子應有權決定是否尋求墮胎	1	2	3	4	5	6	
() 26. 你願意多付稅款以改善社會中老弱者的生活	1	2	3	4	5	6	
() 27. 良好的外表可使事情事半功倍	1	2	3	4	5	6	
() 28. 對大多數女性而言，她的理想職業是擔任母親	1	2	3	4	5	6	
() 29. 應由男人提出求婚	1	2	3	4	5	6	
() 30. 女性應該享有與男性同等的行動自由	1	2	3	4	5	6	
() 31. 為了工作，你不介意減少在家中的時間	1	2	3	4	5	6	
() 32. 在處理有關法律問題時，丈夫應被視為家庭成員的法律代表	1	2	3	4	5	6	
() 33. 在婚姻生活中，女性應有自由拒絕或主動提出性行為	1	2	3	4	5	6	
() 34. 女性不應在事業上受到歧視	1	2	3	4	5	6	

(S) 假設你要為自己選購護膚品，以下因素對你有幾重要呢？同樣，你可以給 1-6 分去表達你的意見。

輪流發問及出示咭片	非常 唔重要					非常 重要
() 35. 該護膚品具可信賴的品質	1	2	3	4	5	6
() 36. 該護膚品可節省時間	1	2	3	4	5	6
() 37. 使用該護膚品可增添個人魅力	1	2	3	4	5	6
() 38. 該護膚品可顯示個人品味	1	2	3	4	5	6
() 39. 購買該護膚品可幫助本土經濟發展	1	2	3	4	5	6
() 40. 該護膚品令你更有效利用時間	1	2	3	4	5	6
() 41. 該護膚品令你身心舒暢	1	2	3	4	5	6
() 42. 該護膚品價格合理	1	2	3	4	5	6
() 43. 該護膚品採用不會破壞自然環境的包裝物料	1	2	3	4	5	6
() 44. 該護膚品可令你將時間分配得更好	1	2	3	4	5	6
() 45. 該護膚品可象徵個人身份	1	2	3	4	5	6
() 46. 該護膚品價格經濟實惠	1	2	3	4	5	6
() 47. 該護膚品可令你同時進行其他工作	1	2	3	4	5	6
() 48. 使用該護膚品可使自己更受歡迎	1	2	3	4	5	6
() 49. 該護膚品令你心情愉快	1	2	3	4	5	6
() 50. 使用該護膚品使家庭關係更融洽	1	2	3	4	5	6
() 51. 使用該護膚品可使別人對自己印象良好	1	2	3	4	5	6
() 52. 該護膚品使你享受使用的過程	1	2	3	4	5	6
() 53. 該護膚品可令人安心使用	1	2	3	4	5	6
() 54. 該護膚品價格便宜	1	2	3	4	5	6
() 55. 該護膚品可舒緩緊張情緒	1	2	3	4	5	6
() 56. 該護膚品可反映個人社會地位	1	2	3	4	5	6
() 57. 使用該護膚品使家人關係更緊密	1	2	3	4	5	6
() 58. 該護膚品物超所值	1	2	3	4	5	6
() 59. 使用該護膚品令自己更被人接受	1	2	3	4	5	6
() 60. 該護膚品採用減少污染的包裝物料	1	2	3	4	5	6
() 61. 使用該護膚品可增進家人感情	1	2	3	4	5	6
() 62. 該護膚品採用循環再造的包裝物料	1	2	3	4	5	6
() 63. 該護膚品質素合符國際標準	1	2	3	4	5	6

最後，想問番少少個人資料方便作整體分析。

問題	答案	編碼	跳問			
D4. 請問你的教育程度...? [示咭]	小學或以下 中學未畢業 中學畢業 大專 大學或以上	1 2 3 4 5	繼續			
D2. 請問你的婚姻狀況...? [示咭]	未婚 已婚 離婚 喪偶	1 2 3 4	繼續			
D8. 請問你有多少個子女呢? [示咭]	冇子女 1 個 2 個 3 個 4 個或以上	0 1 2 3 4	繼續			
D5. 請問你的職業 / 職位`是屬於以下那個類別呢? [示咭]	管理階層 專業人士 (例如會計師、護士) 教師 文職 (例如秘書、文員) 工人 退休人士 主婦 學生 其他 (請註明): _____	1 2 3 4 5 6 7 8 9	繼續			
D6. 請問你 <u>個人</u> 每月平均收入大概是多少呢? [示咭]	冇收入 HK\$5,000 或以下 HK\$5,001 – HK\$10,000 HK\$10,001 – HK\$15,000 HK\$15,001 – HK\$20,000 HK\$20,001 – HK\$30,000 HK\$30,001 – HK\$40,000 HK\$40,001 – HK\$50,000 HK\$50,000 以上	1 2 3 4 5 6 7 8 9	繼續			
D9. 最後，我會讀出一些句子去形容你對自己的看法，同樣，你可以選擇 1-6 分去表達你的意見。						
輪流發問及出示咭片						
	非常唔同意					非常同意
() S1. 你是一個重視家庭嘅女性	1	2	3	4	5	6
() S2. 你是一個愛漂亮嘅女性	1	2	3	4	5	6
() S3. 你是一個事業型女性	1	2	3	4	5	6
() S4. 你是一個重視社會問題嘅女性	1	2	3	4	5	6
() S6. 你(會)是一個傳統嘅母親	1	2	3	4	5	6
() S7. 你是一個愛情至上嘅女性	1	2	3	4	5	6

訪問地區: _____

結束訪問，多謝受訪者!

Appendix II

Female Role Orientation Scale Items (After Refinement)

Love Dimension

1. 同性戀關係是可以接受的
2. 如果兩人相愛，同居是可以接受的
3. 女性有多過一個性伴侶是可以接受的

Wifehood Dimension

4. 照顧家庭應為女性的首要任務
5. 妻子的首要責任是照顧家庭的需要
6. 對已婚女性來說，最重要的是家庭而不是事業

Motherhood Dimension

7. 女性應該以自己作為母親而感到驕傲
8. 生兒育女是女性一生最大的成就
9. 女性在生命中最重要的任務是照顧她的孩子

Societal Dimension

10. 每個人都應參加義務工作來服務社會和國家
11. 我願意多付稅款以改善社會中老弱者的生活
12. 女性應該時常留心時事及政府政策的新聞
13. 我願意為社會的未來作出貢獻

Employee Dimension

14. 女性應有自己的事業
15. 女性不應為家庭辭去工作
16. 為了工作，我不介意減少在家中的時間

Attractiveness Dimension

17. 良好的外表能幫助事業發展
 18. 外表美麗較容易獲得別人接受
 19. 美麗的面孔較易得到別人對你的認同
 20. 良好的外表可使事情事半功倍
-

Appendix III

Chinese Version of Arnott's Feminism Scale

1. 在婚姻生活中女性應服從丈夫.**
2. 女孩應被訓練成主婦, 男孩則應訓練他們從事可發揮他們天份的工作.
3. 應由男人提出求婚.
4. 女性應該享有與男性同等的行動自由.
5. 與男性比較, 女性應將家庭放在事業之上
6. 對大多數女性而言, 她的理想職業是擔任母親.
7. 在婚姻生活中, 女性應有自由自己選擇拒絕或主動提出性行為
8. 在處理有關法律問題時, 丈夫應被視為家庭成員的法律代表
9. 妻子應有權決定是否尋求墮胎
10. 女性不應在事業上受到歧視

** This statement has been modified for the purpose of getting permission to collect data in PRC.

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